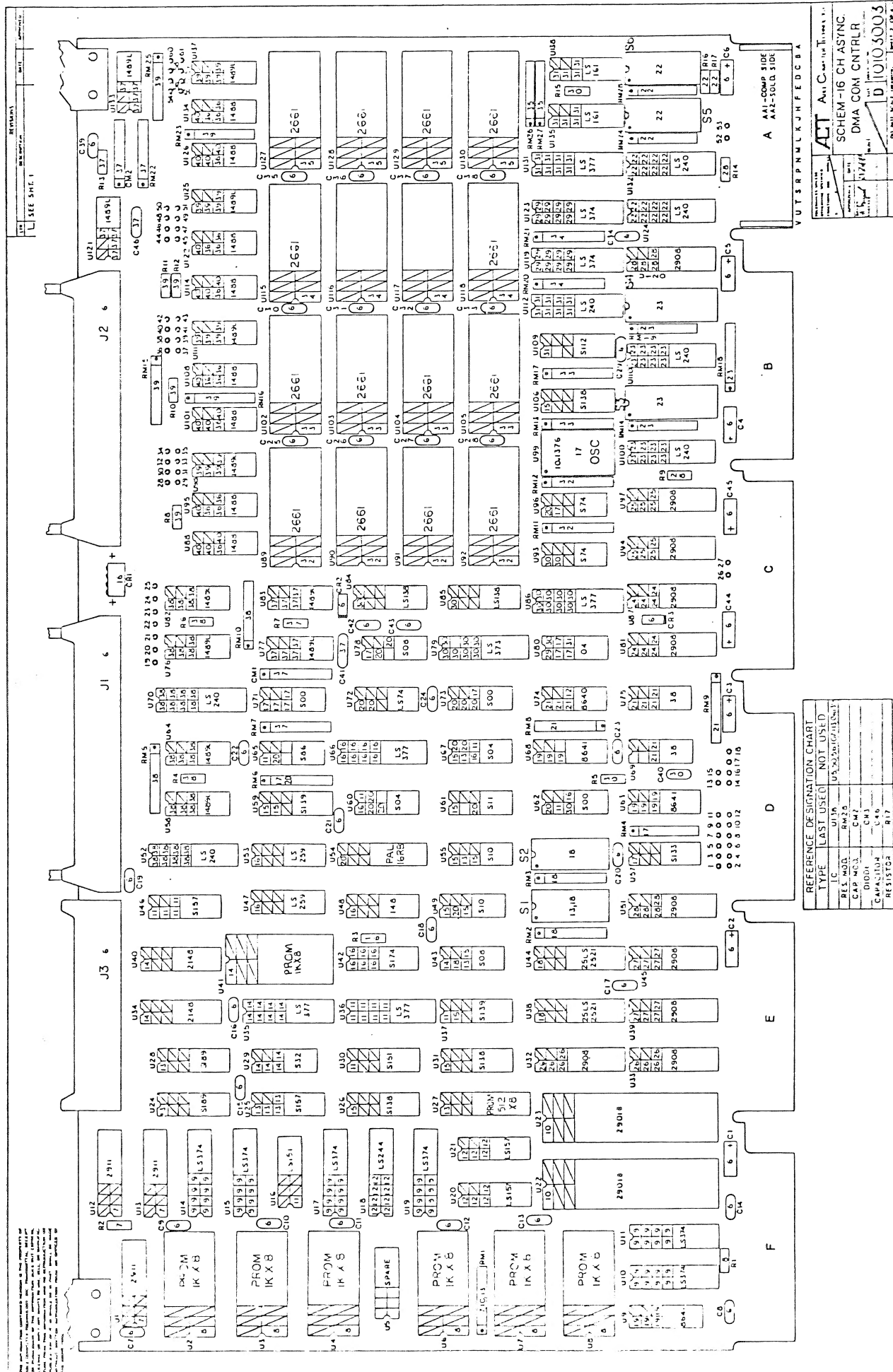


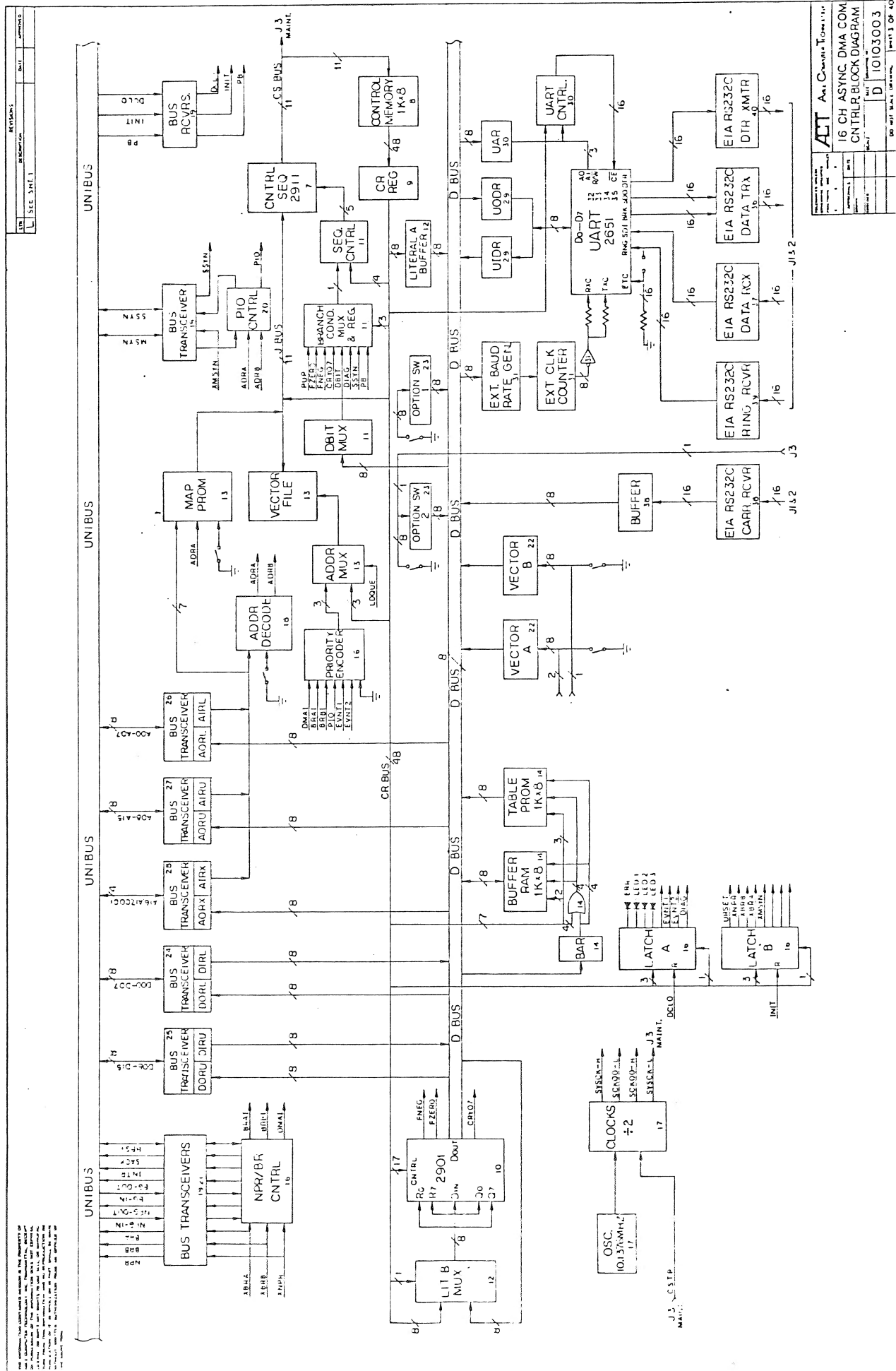
THE INFORMATION CONTAINED HEREON IS THE PROPERTY OF
ABLE COMPUTER TECHNOLOGY, INC. TRANSMITTAL, RECEIPT
OR POSSESSION OF THE INFORMATION DOES NOT EXPRESS,
LICENSE, OR IMPLY ANY RIGHTS TO USE, SELL, OR MANUFACTURE
THIS INFORMATION AND NO REPRODUCTION OR
PUBLICATION OF IT, IN WHOLE OR IN PART, SHALL BE MADE
WITHOUT WRITTEN AUTHORIZATION FROM AN OFFICER OF
THE ABOVE FIRM.

REVISIONS			
LTH	DESCRIPTION	DATE	APPROVED
A	PROD. REL. PER E.O. 00298	4-16-81	SPC
H	INCORPORATED PER E.O. 01227	8-27-82	SPC
L	INCORPORATED PER E.O. 02361	5-7-87	SPC

5. GND IS CONNECTED TO: U1-8, U2-12, U3-12, U4-12, U5-8, U6-12, U7-12, U8-12, U9-8, U10-10, U11-10, U12-8, U13-8, U14-10, U15-10, U16-8, U17-10, U18-10, U19-10, U20-8, U21-8, U22-30, U23-30, U24-8, U25-8, U26-8, U27-10, U28-8, U29-7, U30-8, U31-8, U32-8, U33-5&15, U34-9, U35-10, U36-10, U37-8, U38-10, U39-5&15, U40-9, U41-12, U42-8, U43-7, U44-10, U45-5&15, U46-8, U47-8, U48-8, U49-7, U50-5&15, U51-10, U52-10, U53-8, U54-10, U55-7, U56-8, U57-8, U58-7, U59-8, U60-7, U61-7, U62-7, U63-8, U64-7, U65-7, U66-10, U67-7, U68-8, U69-7, U70-10, U71-7, U72-7, U73-7, U74-10, U75-7, U76-7, U77-7, U78-7, U79-10, U80-7, U81-5&15, U82-7, U83-7, U84-8, U85-8, U86-10, U87-5&15, U88-7, U89-4, U90-4, U91-4, U92-4, U93-7, U94-5&15, U95-7, U96-7, U97-5&15, U98-7, U99-10, U100-10, U101-7, U102-4, U103-4, U104-4, U105-4, U106-8, U107-8, U108-7, U109-8, U110-10, U111-7, U112-10, U113-7, U114-7, U115-4, U116-4, U117-4, U118-4, U119-10, U120-5&15, U121-7, U122-7, U123-10, U124-10, U125-7, U126-7, U127-4, U128-4, U129-4, U130-4, U131-10, U132-10, U133-7, U134-7, U135-8, U136-7, U137-7, U138-8, U139-8, U140-8, U141-8, U142-16, U143-14, U144-20, U145-20, U146-16, U147-16, U148-16, U149-14, U150-20, U151-16, U152-16, U153-16, U154-20, U155-14, U156-14, U157-14, U158-14, U159-16, U160-14, U161-14, U162-14, U163-16, U164-14, U165-14, U166-20, U167-14, U168-16, U169-14, U170-20, U171-14, U172-14, U173-14, U174-8, U175-14, U176-14, U177-14, U178-14, U179-20, U180-14, U181-20, U182-14, U183-14, U184-16, U185-16, U186-20, U187-20, U188-26, U189-26, U190-26, U191-26, U192-26, U193-14, U194-20, U195-16, U196-16, U197-20, U198-14, U199-20, U200-26, U201-26, U202-26, U203-26, U204-26, U205-26, U206-16, U207-16, U208-16, U209-16, U210-20, U211-26, U212-26, U213-26, U214-26, U215-26, U216-26, U217-26, U218-26, U219-26, U220-26, U221-26, U222-26, U223-26, U224-26, U225-26, U226-26, U227-26, U228-26, U229-26, U230-26, U231-26, U232-26, U233-26, U234-26, U235-26, U236-26, U237-16, U238-20, U239-20, U240-18, U241-24, U242-16, U243-14, U244-20, U245-20, U246-16, U247-16, U248-16, U249-14, U250-20, U251-16, U252-16, U253-16, U254-20, U255-14, U256-14, U257-14, U258-14, U259-16, U260-14, U261-14, U262-14, U263-16, U264-14, U265-14, U266-20, U267-14, U268-16, U269-14, U270-20, U271-14, U272-14, U273-14, U274-8, U275-14, U276-14, U277-14, U278-14, U279-20, U280-14, U281-20, U282-14, U283-14, U284-16, U285-16, U286-20, U287-20, U288-26, U289-26, U290-26, U291-26, U292-26, U293-14, U294-20, U295-16, U296-16, U297-20, U298-14, U299-20, U300-26, U301-26, U302-26, U303-26, U304-26, U305-26, U306-16, U307-16, U308-20, U309-20, U310-18, U311-20, U312-20, U313-20, U314-20, U315-20, U316-20, U317-16, U318-20, U319-20, U320-20, U321-20, U322-20, U323-20, U324-20, U325-20, U326-20, U327-20, U328-20, U329-20, U330-20, U331-20, U332-20, U333-20, U334-20, U335-20, U336-20, U337-16, U338-20, U339-20, U340-18, U341-24, U342-16, U343-14, U344-20, U345-20, U346-16, U347-16, U348-16, U349-14, U350-20, U351-16, U352-16, U353-16, U354-20, U355-14, U356-14, U357-14, U358-14, U359-16, U360-14, U361-14, U362-14, U363-16, U364-14, U365-14, U366-20, U367-14, U368-16, U369-14, U370-20, U371-14, U372-14, U373-14, U374-8, U375-14, U376-14, U377-14, U378-14, U379-20, U380-14, U381-20, U382-14, U383-14, U384-16, U385-16, U386-20, U387-20, U388-26, U389-26, U390-26, U391-26, U392-26, U393-14, U394-20, U395-16, U396-16, U397-20, U398-14, U399-20, U400-26, U401-26, U402-26, U403-26, U404-26, U405-26, U406-16, U407-16, U408-20, U409-20, U410-18, U411-20, U412-20, U413-20, U414-20, U415-20, U416-20, U417-20, U418-20, U419-20, U420-20, U421-20, U422-20, U423-20, U424-20, U425-20, U426-20, U427-20, U428-20, U429-20, U430-20, U431-20, U432-20, U433-20, U434-20, U435-20, U436-20, U437-16, U438-20, U439-20, U440-18, U441-24, U442-16, U443-14, U444-20, U445-20, U446-16, U447-16, U448-16, U449-14, U450-20, U451-16, U452-16, U453-16, U454-20, U455-14, U456-14, U457-14, U458-14, U459-16, U460-14, U461-14, U462-14, U463-16, U464-14, U465-14, U466-20, U467-14, U468-16, U469-14, U470-20, U471-14, U472-14, U473-14, U474-8, U475-14, U476-14, U477-14, U478-14, U479-20, U480-14, U481-20, U482-14, U483-14, U484-16, U485-16, U486-20, U487-20, U488-26, U489-26, U490-26, U491-26, U492-26, U493-14, U494-20, U495-16, U496-16, U497-20, U498-14, U499-20, U500-26, U501-26, U502-26, U503-26, U504-26, U505-26, U506-16, U507-16, U508-20, U509-20, U510-18, U511-20, U512-20, U513-20, U514-20, U515-20, U516-20, U517-20, U518-20, U519-20, U520-20, U521-20, U522-20, U523-20, U524-20, U525-20, U526-20, U527-20, U528-20, U529-20, U530-20, U531-20, U532-20, U533-20, U534-20, U535-20, U536-20, U537-16, U538-20, U539-20, U540-18, U541-24, U542-16, U543-14, U544-20, U545-20, U546-16, U547-16, U548-16, U549-14, U550-20, U551-16, U552-16, U553-16, U554-20, U555-14, U556-14, U557-14, U558-14, U559-16, U560-14, U561-14, U562-14, U563-16, U564-14, U565-14, U566-20, U567-14, U568-16, U569-14, U570-20, U571-14, U572-14, U573-14, U574-8, U575-14, U576-14, U577-14, U578-14, U579-20, U580-14, U581-20, U582-14, U583-14, U584-16, U585-16, U586-20, U587-20, U588-26, U589-26, U590-26, U591-26, U592-26, U593-14, U594-20, U595-16, U596-16, U597-20, U598-14, U599-20, U600-26, U601-26, U602-26, U603-26, U604-26, U605-26, U606-16, U607-16, U608-20, U609-20, U610-18, U611-20, U612-20, U613-20, U614-20, U615-20, U616-20, U617-20, U618-20, U619-20, U620-20, U621-20, U622-20, U623-20, U624-20, U625-20, U626-20, U627-20, U628-20, U629-20, U630-20, U631-20, U632-20, U633-20, U634-20, U635-20, U636-20, U637-16, U638-20, U639-20, U640-18, U641-24, U642-16, U643-14, U644-20, U645-20, U646-16, U647-16, U648-16, U649-14, U650-20, U651-16, U652-16, U653-16, U654-20, U655-14, U656-14, U657-14, U658-14, U659-16, U660-14, U661-14, U662-14, U663-16, U664-14, U665-14, U666-20, U667-14, U668-16, U669-14, U670-20, U671-14, U672-14, U673-14, U674-8, U675-14, U676-14, U677-14, U678-14, U679-20, U680-14, U681-20, U682-14, U683-14, U684-16, U685-16, U686-20, U687-20, U688-26, U689-26, U690-26, U691-26, U692-26, U693-14, U694-20, U695-16, U696-16, U697-20, U698-14, U699-20, U700-26, U701-26, U702-26, U703-26, U704-26, U705-26, U706-16, U707-16, U708-20, U709-20, U710-18, U711-20, U712-20, U713-20, U714-20, U715-20, U716-20, U717-20, U718-20, U719-20, U720-20, U721-20, U722-20, U723-20, U724-20, U725-20, U726-20, U727-20, U728-20, U729-20, U730-20, U731-20, U732-20, U733-20, U734-20, U735-20, U736-20, U737-16, U738-20, U739-20, U740-18, U741-24, U742-16, U743-14, U744-20, U745-20, U746-16, U747-16, U748-16, U749-14, U750-20, U751-16, U752-16, U753-16, U754-20, U755-14, U756-14, U757-14, U758-14, U759-16, U760-14, U761-14, U762-14, U763-16, U764-14, U765-14, U766-20, U767-14, U768-16, U769-14, U770-20, U771-14, U772-14, U773-14, U774-8, U775-14, U776-14, U777-14, U778-14, U779-20, U780-14, U781-20, U782-14, U783-14, U784-16, U785-16, U786-20, U787-20, U788-26, U789-26, U790-26, U791-26, U792-26, U793-14, U794-20, U795-16, U796-16, U797-20, U798-14, U799-20, U800-26, U801-26, U802-26, U803-26, U804-26, U805-26, U806-16, U807-16, U808-20, U809-20, U810-18, U811-20, U812-20, U813-20, U814-20, U815-20, U816-20, U817-20, U818-20, U819-20, U820-20, U821-20, U822-20, U823-20, U824-20, U825-20, U826-20, U827-20, U828-20, U829-20, U830-20, U831-20, U832-20, U833-20, U834-20, U835-20, U836-20, U837-16, U838-20, U839-20, U840-18, U841-24, U842-16, U843-14, U844-20, U845-20, U846-16, U847-16, U848-16, U849-14, U850-20, U851-16, U852-16, U853-16, U854-20, U855-14, U856-14, U857-14, U858-14, U859-16, U860-14, U861-14, U862-14, U863-16, U864-14, U865-14, U866-20, U867-14, U868-16, U869-14, U870-20, U871-14, U872-14, U873-14, U874-8, U875-14, U876-14, U877-14, U878-14, U879-20, U880-14, U881-20, U882-14, U883-14, U884-16, U885-16, U886-20, U887-20, U888-26, U889-26, U890-26, U891-26, U892-26, U893-14, U894-20, U895-16, U896-16, U897-20, U898-14, U899-20, U900-26, U901-26, U902-26, U903-26, U904-26, U905-26, U906-16, U907-16, U908-20, U909-20, U910-18, U911-20, U912-20, U913-20, U914-20, U915-20, U916-20, U917-20, U918-20, U919-20, U920-20, U921-20, U922-20, U923-20, U924-20, U925-20, U926-20, U927-20, U928-20, U929-20, U930-20, U931-20, U932-20, U933-20, U934-20, U935-20, U936-20, U937-16, U938-20, U939-20, U940-18, U941-24, U942-16, U943-14, U944-20, U945-20, U946-16, U947-16, U948-16, U949-14, U950-20, U951-16, U952-16, U953-16, U954-20, U955-14, U956-14, U957-14, U958-14, U959-16, U960-14, U961-14, U962-14, U963-16, U964-14, U965-14, U966-20, U967-14, U968-16, U969-14, U970-20, U971-14, U972-14, U973-14, U974-8, U975-14, U976-14, U977-14, U978-14, U979-20, U980-14, U981-20, U982-14, U983-14, U984-16, U985-16, U986-20, U987-20, U988-26, U989-26, U990-26, U991-26, U992-26, U993-14, U994-20, U995-16, U996-16, U997-20, U998-14, U999-20, U1000-26, U1001-26, U1002-26, U1003-26, U1004-26, U1005-26, U1006-16, U1007-16, U1008-20, U1009-20, U1010-18, U1011-20, U1012-20, U1013-20, U1014-20, U1015-20, U1016-20, U1017-20, U1018-20, U1019-20, U1020-20, U1021-20, U1022-20, U1023-20, U1024-20, U1025-20, U1026-20, U1027-20, U1028-20, U1029-20, U1030-20, U1031-20, U1032-20, U1033-20, U1034-20, U1035-20, U1036-20, U1037-16, U1038-20, U1039-20, U1040-18, U1041-24, U1042-16, U1043-14, U1044-20, U1045-20, U1046-16, U1047-16, U1048-16, U1049-14, U1050-20, U1051-16, U1052-16, U1053-16, U1054-20, U1055-14, U1056-14, U1057-14, U1058-14, U1059-16, U1060-14, U1061-14, U1062-14, U1063-16, U1064-14, U1065-14, U1066-20, U1067-14, U1068-16, U1069-14, U1070-20, U1071-14, U1072-14, U1073-14, U1074-8, U1075-14, U1076-14, U1077-14, U1078-14, U1079-20, U1080-14, U1081-20, U1082-14, U1083-14, U1084-16, U1085-16, U1086-20, U1087-20, U1088-26, U1089-26, U1090-26, U1091-26, U1092-26, U1093-14, U1094-20, U1095-16, U1096-16, U1097-20, U1098-14, U1099-20, U1100-26, U1101-26, U1102-26, U1103-26, U1104-26, U1105-26, U1106-16, U1107-16, U1108-20, U1109-20, U1110-18, U1111-20, U1112-20, U1113-20, U1114-20, U1115-20, U1116-20, U1117-20, U1118-20, U1119-20, U1120-20, U1121-20, U1122-20, U1123-20, U1124-20, U1125-20, U1126-20, U1127-20, U1128-20, U1129-20, U1130-20, U1131-20, U1132-20, U1133-20, U1134-20, U1135-20, U1136-20, U1137-16, U1138-20, U1139-20, U1140-18, U1141-24, U1142-16, U1143-14, U1144-20, U1145-20, U1146-16, U1147-16, U1148-16, U1149-14, U1150-20, U1151-16, U1152-16, U1153-16, U1154-20, U1155-14, U1156-14, U1157-14, U1158-14, U1159-16, U1160-14, U1161-14, U1162-14, U1163-16, U1164-14, U1165-14, U1166-20, U1167-14, U1168-16, U1169-14, U1170-20, U1171-14, U1172-14, U1173-14, U1174-8, U1175-14, U1176-14, U1177-14, U1178-14, U1179-20, U1180-14, U1181-20, U1182-14, U1183-14, U1184-16, U1185-16, U1186-20, U1187-20, U1188-26, U1189-26, U1190-26, U1191-26, U1192-26, U1193-14, U1194-20, U1195-16, U1196-16, U1197-20, U1198-14, U1199-20, U1200-26, U1201-26, U1202-26, U1203-26, U1204-26, U1205-26, U1206-16, U1207-16, U1208-20, U1209-20, U1210-18, U1211-20, U1212-20, U1213-20, U1214-20, U1215-20, U1216-20, U1217-20, U1218-20, U1219-20, U1220-20, U1221-20, U1222-20, U1223-20, U1224-20, U1225-20, U1226-20, U1227-20, U1228-20, U1229-20, U1230-20, U1231-20, U1232-20, U1233-20, U1234-20, U1235-20, U1236-20, U1237-16, U1238-20, U1239-20, U1240-18, U1241-24, U1242-16, U1243-14, U1244-20, U1245-20, U1246-16, U1247-16, U1248-16, U1249-14, U1250-20, U1251-16, U1252-16, U1253-16, U1254-20, U1255-14, U1256-14, U1257-14, U1258-14, U1259-16, U1260-14, U1261-14, U1262-14, U1263-16, U1264-14, U1265-14, U1266-20, U1267-14, U1268-16, U1269-14, U1270-20, U1271-14, U1272-14, U1273-14, U1274-8, U1275-14, U1276-14, U1277-14, U1278-14, U1279-20, U1280-14, U1281-20, U1282-14, U1283-14, U1284-16, U1285-16, U1286-20, U1287-20, U1288-26, U1289-26, U1290-26, U1291-26, U1292-26, U1293-14, U1294-20, U1295-16, U1296-16, U1297-20, U1298-14, U1299-20, U1300-26, U1301-26, U1302-26, U1303-26, U1304-26, U1305-26, U1306-16, U1307-16, U1308-20, U1309-20, U1310-18, U1311-20, U1312-20, U1313-20, U1314-20, U1315-20, U1316-20, U1317-20, U1318-20, U1319-20, U1320-20, U1321-20, U1322-20, U1323-20, U1324-20, U1325-20, U1326-20, U1327-20, U1328-20, U1329-20, U1330-20, U1331-20, U1332-20, U1333-20, U1334-20, U1335-20, U1336-20, U1337-16, U1338-20, U1339-20, U1340-18, U1341-24, U1342-16, U1343-14, U1344-20, U1345-20, U1346-16, U1347-16, U1348-16, U1349-14, U1350-20, U1351-16, U1352-16, U1353-16, U1354-20, U1355-14, U1356-14, U1357-14, U1358-14, U1359-16, U1360-14, U1361-14, U1362-14, U1363-16, U1364-14, U1365-14, U1366-20, U1367-14, U1368-16, U1369-14, U1370-20, U1371-14, U1372-14, U1373-14, U1374-8, U1375-14, U1376-14, U1377-14, U1378-14, U1379-20, U1380-14, U1381-20, U1382-14, U1383-14, U1384-16, U1385-16, U1386-20, U1387-20, U1388-26, U1389-26, U1390-26, U1391-26, U1392-26, U1393-14, U1394-20, U1395-16, U1396-16, U1397-20, U1398-14, U1399-20, U1400-26, U1401-26, U1402-26, U1403-26, U1404-26, U1405-26, U1406-16, U1407-16, U1408-20, U1409-20, U1410-18, U1411-20, U1412-20, U1413-20, U1414-20, U1415-20, U1416-20, U1417-20, U1418-20, U1419-20, U1420-20, U1421-20, U1422-20, U1423-20, U1424-20, U1425-20, U1426-20, U1427-20, U1428-20, U1429-20, U1430-20, U1431-20, U1432-20, U1433-20, U1434-20, U1435-20, U1436-20, U1437-16, U1438-20, U1439-20, U1440-18, U1441-24, U1442-16, U1443-14, U1444-20, U1445-20, U1446-16, U1447-16, U1448-16, U1449-14, U1450-20, U1451-16, U1452-16, U1453-16, U1454-20, U1455-14, U1456-14, U1457-14, U1458-14, U1459-16, U1460-14, U1461-1



REFERENCE DESIGNATION CHART		
TYPE	LAST USED	NOT USED
IC	U106	U5, U6, U7, U8, U9, U11
RES. MOD.	RM20	
CAP. MOD.	CM2	
DIODE	DM3	
CAPACITOR	CM6	
RESISTOR	RL7	



THE INFORMATION CONTAINED HEREIN IS THE PROPERTY OF
AND IS NOT TO BE DISCLOSED OR REPRODUCED IN ANY MANNER
WITHOUT THE WRITTEN PERMISSION OF THE COMPANY.
THIS DRAWING IS THE PROPERTY OF THE COMPANY AND IS NOT
TO BE LOANED, REPRODUCED OR COPIED IN ANY MANNER
WITHOUT THE WRITTEN PERMISSION OF THE COMPANY.

290I DATA PATH PHRASE										DBUS PHRASE										ORDER PHRASE										SEQUENCE CONTROL PHRASE																	
47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	09	08	07	06	05	04	03	02	01	00
D	+	S	C	A		B		D/S		D DEST.	D SRCE.	LITERAL A		D	T/F	TEST	SEQ.	AD		LIT B / RESUME DATA	BRANCH	ADDRESS																									
				FILE	FILE	FILE	FILE	ORDER	ADDR.			RD-DATA ERR URSEL	RD-DATA LED1 XNPR																																		
Q	R + S	A	Q	Q	Q	Q	Q	DBUS	LITA	NULL		RD-DATA ERR URSEL	Q	-GOTO	LITB			Q																													
NOD	S - R	A	B	1	1	1	1	BRR	TPRM	REL_PIO		WRT-DATA LED1 XNPR	1	-ALUZ	RETURN			1				1																									
B (BYPASS)	R - S	Q	Q		2	2	2	DORL	MEM	SET_INTR		RD-STAT LED2 XBRB		-ALUNEG	GOTO			2				2																									
B	R OR S	Q	B		3	3	3	DORU	MVR	RESUME		N/A LED3 XBRA		-CRY	CALL			3				3																									
BQ RIGHT	R AND S	Q	A		4	4	4	MAR	ALU	NOT USED		RD-MODE NOT USED XMSYN		-DBIT	MAP_PIO			4				4																									
B RIGHT	R AND S	D	A		5	5	5	UODR	UIDR	UART		WRT-MODE EVNT1 NOT USED		-NO-DIAG	N/A			5				5																									
BQ LEFT	R XOR S	D	Q		6	6	6	UAR	DURL	A LATCH		RD-CMD EVNT2 NOT USED		-SSYN	VECTOR			6				6																									
B LEFT	R XNOR S	D	Q		7	7	7	MEM	DIRU	B LATCH		WRT-CMD DIAG NOT USED		-PB	N/A			7				7																									
					8	8	8	AORL		N/A				GOTO				8				8																									
					9	9	9	AORU		N/A				ALUZ				9				9																									
A					10	10	10	AORX		N/A				ALUNEG				A				A																									
B					11	11	11	NOT USED		N/A				CRY				B				B																									
C					12	12	12	N/A		N/A				DBIT				C				C																									
D					13	13	13	N/A		N/A				NO-DIAG				D				D																									
E					14	14	14	N/A		N/A				SSYN				E				E																									
F					15	15	15	N/A		N/A				PB				F				F																									

PRIORITY	EVENTS
7	PIO
6	DMAI
5	BRAI
4	BRBI
3	NOT USED
2	EVNT2
1	EVNT1
0	SCAN

47	46	45	44	43	42	41	40	39	38	37	36	35	34	33	32	31	30	29	28	27	26	25	24	23	22	21	20	19	18	17	16	15	14	13	12	11	10	09	08	07	06	05	04	03	02	01	00		

PRIORITY	EVENTS
7	PIO
6	DMAI
5	BRAI
4	BRBI
3	NOT USED
2	EVNT2
1	EVNT1
0	SCAN

THE INFORMATION CONTAINED HEREIN IS THE PROPERTY OF
 THE UNITED STATES GOVERNMENT AND IS LOANED TO YOUR
 AGENCY FOR YOUR INFORMATION AND USE ONLY. IT AND ITS
 CONTENTS ARE NOT TO BE DISTRIBUTED OUTSIDE YOUR AGENCY.
 THIS INFORMATION IS NOT TO BE REPRODUCED OR TRANSMITTED
 IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL,
 INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION
 STORAGE AND RETRIEVAL SYSTEM.

SHT	I	A	2	SHT
		A	+5V	6
		B		
		C	GND	6
		D		
		E		
		F		
		H		
		J		
		K		
		L		
		M		
28	BUS-A21-L	N		
28	BUS-A20-L	P		
		R		
		S		
6	GND	T		
		U		
		V		

SHT	I	C	2	SHT
21	BUS-NPG-IN-H	A	+5V	6
21	BUS-NPGO-H	B	-15V	6
		C	GND	6
		D	BUS-D15-L	25
		E	BUS-D14-L	25
		F	BUS-D13-L	25
25	BUS-D11-L	H	BUS-D12-L	25
		J	BUS-D10-L	25
		K	BUS-DO9-L	25
		L	BUS-DO8-L	25
		M	BUS-DO7-L	24
19	BUS-DCLO-L	N	BUS-DO4-L	24
		P	BUS-DO5-L	24
		R	BUS-DO1-L	24
19	BUS-P8-L	S	BUS-DOO-L	24
6	GND	T	BUS-DO3-L	24
6	+15V	U	BUS-DO2-L	24
		V	BUS-DO6-L	24

SHT	I	E	2	SHT
		A	+5V	6
		B		
27	BUS-A12-L	C	GND	6
28	BUS-A17-L	D	BUS-A15-L	27
19	BUS-MSYN-L	E	BUS-A16-L	28
26	BUS-AO2-L	F	BUS-C1-L	28
26	BUS-AO1-L	H	BUS-AOO-L	26
19	BUS-SSYN-L	J	BUS-CO-L	28
27	BUS-A14-L	K	BUS-A13-L	27
27	BUS-A11-L	L		
		M		
		N	BUS-AO8-L	27
27	BUS-A10-L	P	BUS-AO7-L	26
27	BUS-AO9-L	R		
		S		
6	GND	T		
26	BUS-AO6-L	U	BUS-AO4-L	26
26	BUS-AO5-L	V	BUS-AO3-L	26

SHT	I	B	2	SHT
		A	+5V	6
		B		
		C	GND	6
		D		
28	BUS-A19-L	E	BUS-A18-L	28
		F		
		H		
		J		
		K		
		L		
		M		
		N		
		P		
		R		
		S		
6	GND	T		
		U		
		V		

SHT	I	D	2	SHT
		A	+5V	6
		B		
		C	GND	6
		D		
		E	BUS-BR6-L	21
		F	BUS-BR5-L	21
		H	BUS-BR4-L	21
		J		
		K	BUS-BG7-IN-H	21
19	BUS-INIT-L	L	BUS-BG7OUT-H	21
		M	BUS-BG6-IN-H	21
		N	BUS-BG6OUT-H	21
		P	BUS-BG5-IN-H	21
		R	BUS-BG5OUT-H	21
		S	BUS-BG4-IN-H	21
6	GND	T	BUS-BG4OUT-H	21
		U		
		V		

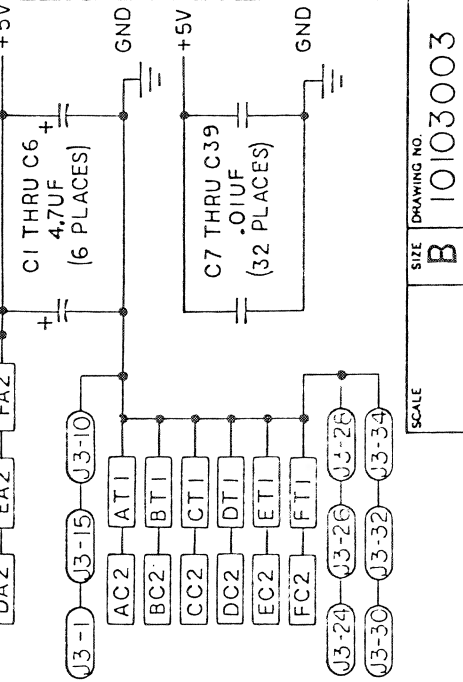
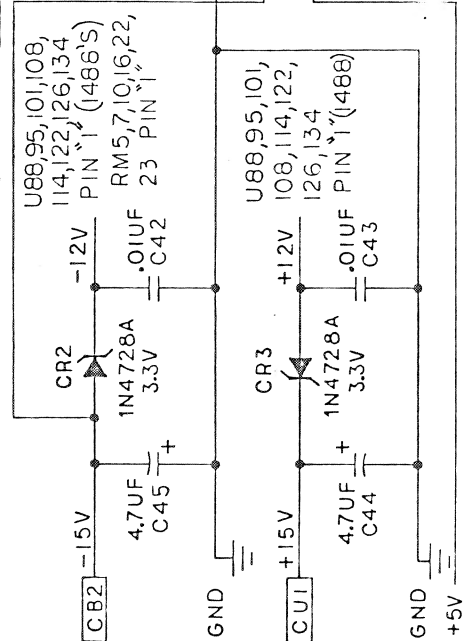
SHT	I	F	2	SHT
		A	+5V	6
		B		
		C	GND	6
19	BUS-BBSY-L	D		
		E		
		F		
		H		
19	BUS-NPR-L	J		
		K		
		L		
19	BUS-INTR-L	M		
		N		
		P		
		R		
		S		
6	GND	T	BUS-SACK-L	19
		U		
		V		

THIS DRAWING IS THE PROPERTY OF BUSHNIP, INC. AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM. WITHOUT THE WRITTEN PERMISSION OF BUSHNIP, INC.

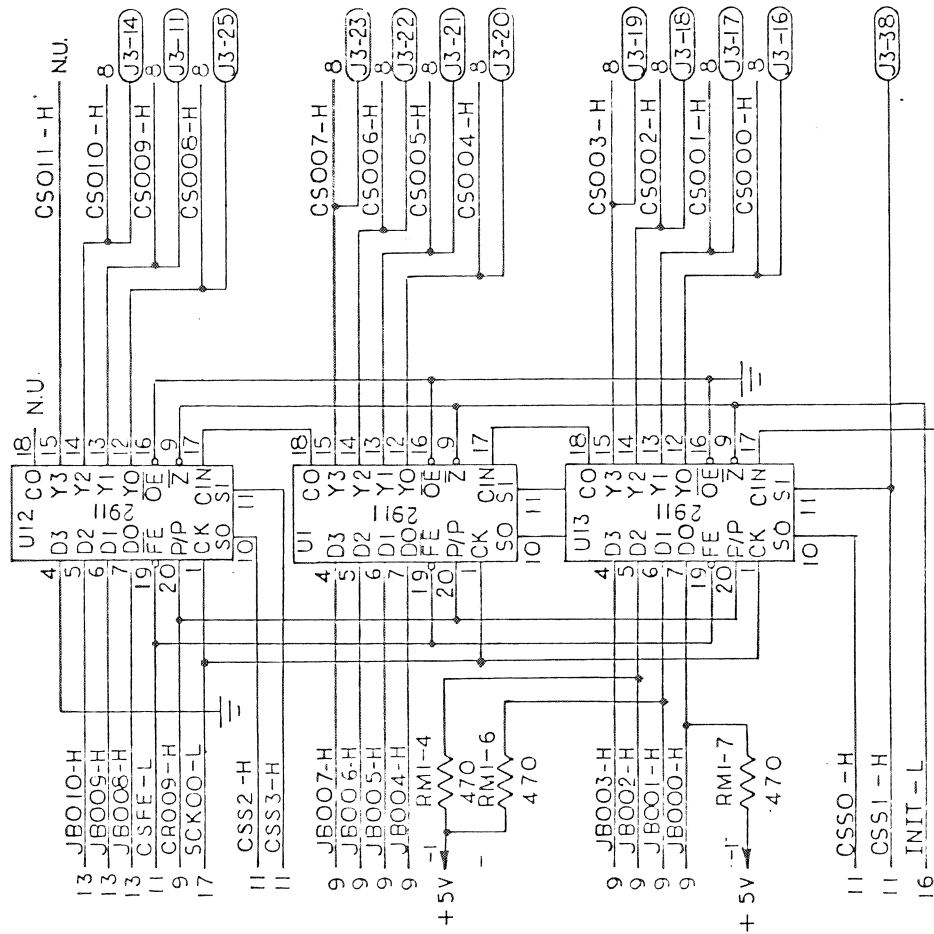
SHT	J1	SHT
40	DTR00-H 1 2 CARRO0-H 38	
40	DTR01-H 3 4 CARRO1-H 38	
40	DTR02-H 5 6 CARRO2-H 38	
40	DTR03-H 7 8 CARRO3-H 38	
40	DTR04-H 9 10 CARRO4-H 38	
40	DTR05-H 11 12 CARRO5-H 38	
40	DTR06-H 13 14 CARRO6-H 38	
40	DTR07-H 15 16 CARRO7-H 38	
23	MAIN-H 17 18 GND 36	
36	RXD00-H 19 20 RING00-H 39	
36	RXD01-H 21 22 GND 36	
36	RXD02-H 23 24 RING01-H 39	
36	RXD03-H 25 26 GND 36	
36	RXD04-H 27 28 RING02-H 39	
36	RXD05-H 29 30 GND 6	
36	RXD06-H 31 32 RING03-H 39	
36	RXD07-H 33 34 GND 6	
36	RXD08-H 35 36 RING04-H 39	
36	RXD09-H 37 38 GND 6	
36	RXD10-H 39 40 RING05-H 39	
36	RXD11-H 41 42 GND 6	
36	RXD12-H 43 44 RING06-H 39	
36	RXD13-H 45 46 GND 6	
36	RXD14-H 47 48 RING07-H 39	
36	RXD15-H 49 50 GND 6	

SHT	J2	SHT
40	DTR08-H 1 2 CARRO8-H 38	
40	DTR09-H 3 4 CARRO9-H 38	
40	DTR10-H 5 6 CARRO10-H 38	
40	DTR11-H 7 8 CARRO11-H 38	
40	DTR12-H 9 10 CARRO12-H 38	
40	DTR13-H 11 12 CARRO13-H 38	
40	DTR14-H 13 14 CARRO14-H 38	
40	DTR15-H 15 16 CARRO15-H 38	
36	GND 17 18 GND 36	
36	RXD08-H 19 20 RING08-H 39	
36	RXD09-H 21 22 GND 36	
36	RXD10-H 23 24 RING09-H 39	
36	RXD11-H 25 26 GND 36	
36	RXD12-H 27 28 RING10-H 39	
36	RXD13-H 29 30 GND 6	
36	RXD14-H 31 32 RING11-H 39	
36	RXD15-H 33 34 GND 6	
36	RXD16-H 35 36 RING12-H 39	
36	RXD17-H 37 38 GND 6	
36	RXD18-H 39 40 RING13-H 39	
36	RXD19-H 41 42 GND 6	
36	RXD20-H 43 44 RING14-H 39	
36	RXD21-H 45 46 GND 6	
36	RXD22-H 47 48 RING15-H 39	
36	RXD23-H 49 50 GND 6	

SHT	J3	SHT
6	GND 1 2 DB000-H 24	
24	DB001-H 3 4 DB002-H 24	
24	DB003-H 5 6 DB004-H 24	
24	DB005-H 7 8 DB006-H 24	
24	DB007-H 9 10 GND 6	
7	CS009-H 11 12	
6	+5V 13 14 CS010-H 7	
6	GND 15 16 CS000-H 7	
7	CS001-H 17 18 CS002-H 7	
7	CS003-H 19 20 CS004-H 7	
7	CS005-H 21 22 CS006-H 7	
7	CS007-H 23 24 GND 6	
7	CS008-H 25 26	
17	MINIT-L 27 28	
17	MDCL0-L 29 30	
17	CSTP-L 31 32	
17	SYSCK-L 33 34 GND 6	
22	SSW1-L 35 36 SSW2-L 22	
22	SSW3-L 37 38 CSS1-H 7	
6	+5V 39 40 +5V 6	



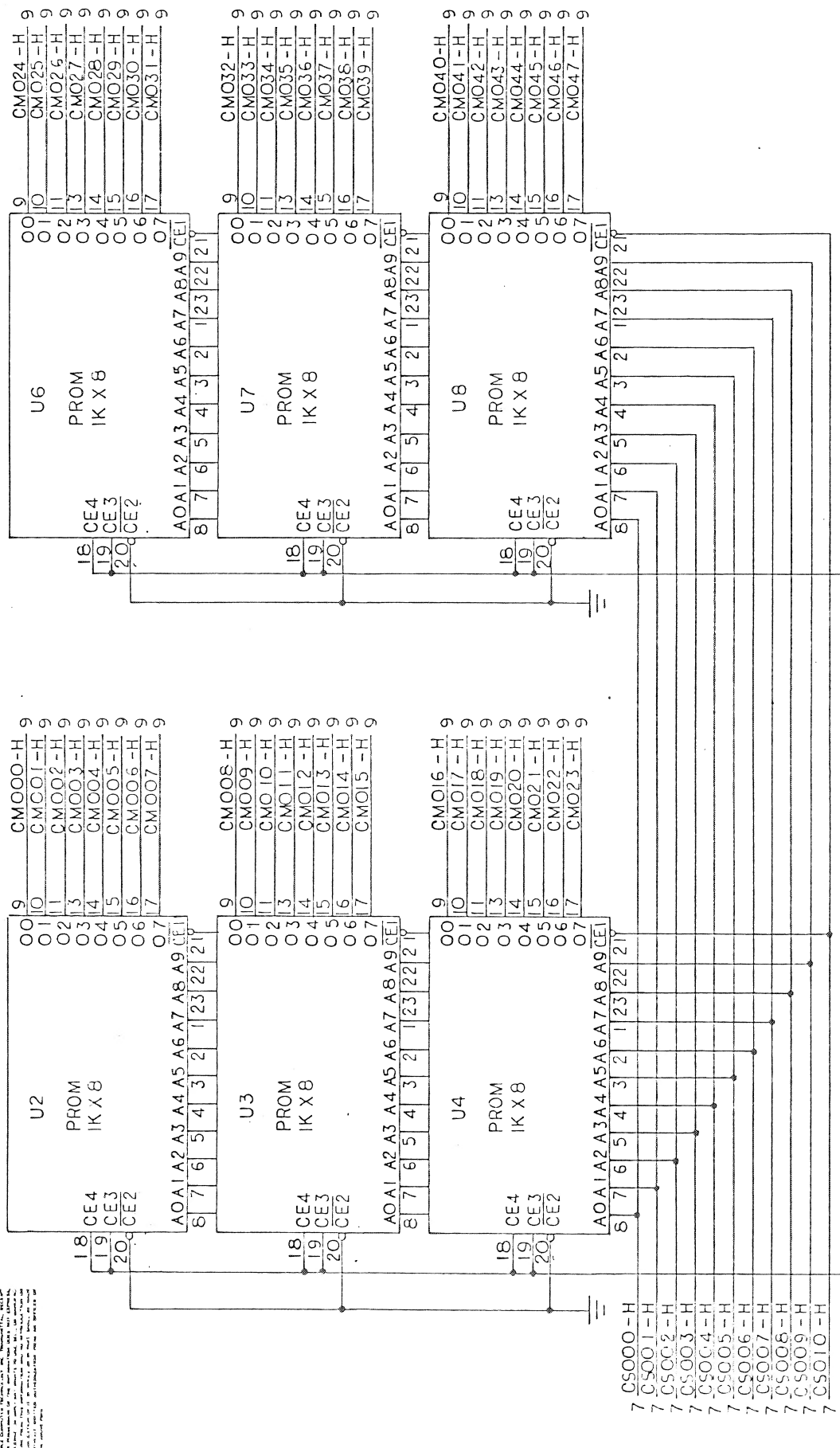
See instruction sheet for details of the operation of the sequencer. The sequencer is a self-contained unit which can be used in conjunction with the main computer system. It is designed to provide a sequence of operations for the computer system. The sequencer is a self-contained unit which can be used in conjunction with the main computer system. It is designed to provide a sequence of operations for the computer system.



SI	SO	OPERATION
0	0	INCREMENT
0	1	NOT IMPLEMENTED
1	0	RETURN
1	1	GOTO/MAP/CALL/VECTOR

CONTROL SEQUENCER

This drawing is the property of
 the company and is not to be
 reproduced or transmitted in
 any form or by any means
 electronic, mechanical, or
 otherwise, without prior
 written permission of the
 company.



CONTROL MEMORY

THE INFORMATION CONTAINED HEREIN IS UNCLASSIFIED EXCEPT WHERE SHOWN OTHERWISE BY THE MARKING OF THIS DOCUMENT. IT IS THE PROPERTY OF THE NATIONAL ARCHIVES AND IS LOANED TO YOUR AGENCY. IT AND ITS CONTENTS ARE NOT TO BE DISTRIBUTED OUTSIDE YOUR AGENCY. FOR MORE INFORMATION, CONTACT THE NATIONAL ARCHIVES AT COLLEGE PARK, MARYLAND 20740-6001.

8	CM000 - H	8	JB000 - H
8	CM001 - H	7	JB001 - H
8	CM002 - H	4	JB002 - H
8	CM003 - H	3	JB003 - H
8	CM004 - H	13	JB004 - H
8	CM005 - H	14	JB005 - H
8	CM006 - H	17	JB006 - H
8	CM007 - H	18	JB007 - H

7,12,13

9 CRO10 - H

8	CM008 - H	5	CRO08 - H
8	CM009 - H	6	CRO09 - H
8	CM010 - H	7,11	CRO10 - H
8	CM011 - H	9,11	CRO11 - H
8	CM012 - H	14	CRO12 - H
8	CM013 - H	16	CRO13 - H
8	CM014 - H	18	CRO14 - H
8	CM015 - H	19	CRO15 - H

12,14,16

8	CM016 - H	3	CRO16 - H
8	CM017 - H	4	CRO17 - H
8	CM018 - H	5	CRO18 - H
8	CM019 - H	6	CRO19 - H
8	CM020 - H	7	CRO20 - H
8	CM021 - H	8	CRO21 - H
8	CM022 - H	9	CRO22 - H
8	CM023 - H	10	CRO23 - H

17 SCK00 - L

8	CM024 - H	3	UI9 Q
8	CM025 - H	4	D
8	CM026 - H	5	D
8	CM027 - H	6	D
8	CM028 - H	7	D
8	CM029 - H	8	D
8	CM030 - H	9	D
8	CM031 - H	10	D

CK OE

8	CM032 - H	7	UI10 Q
8	CM033 - H	8	D
8	CM034 - H	9	D
8	CM035 - H	10	D
8	CM036 - H	11	D
8	CM037 - H	12	D
8	CM038 - H	13	D
8	CM039 - H	14	D

CK OE

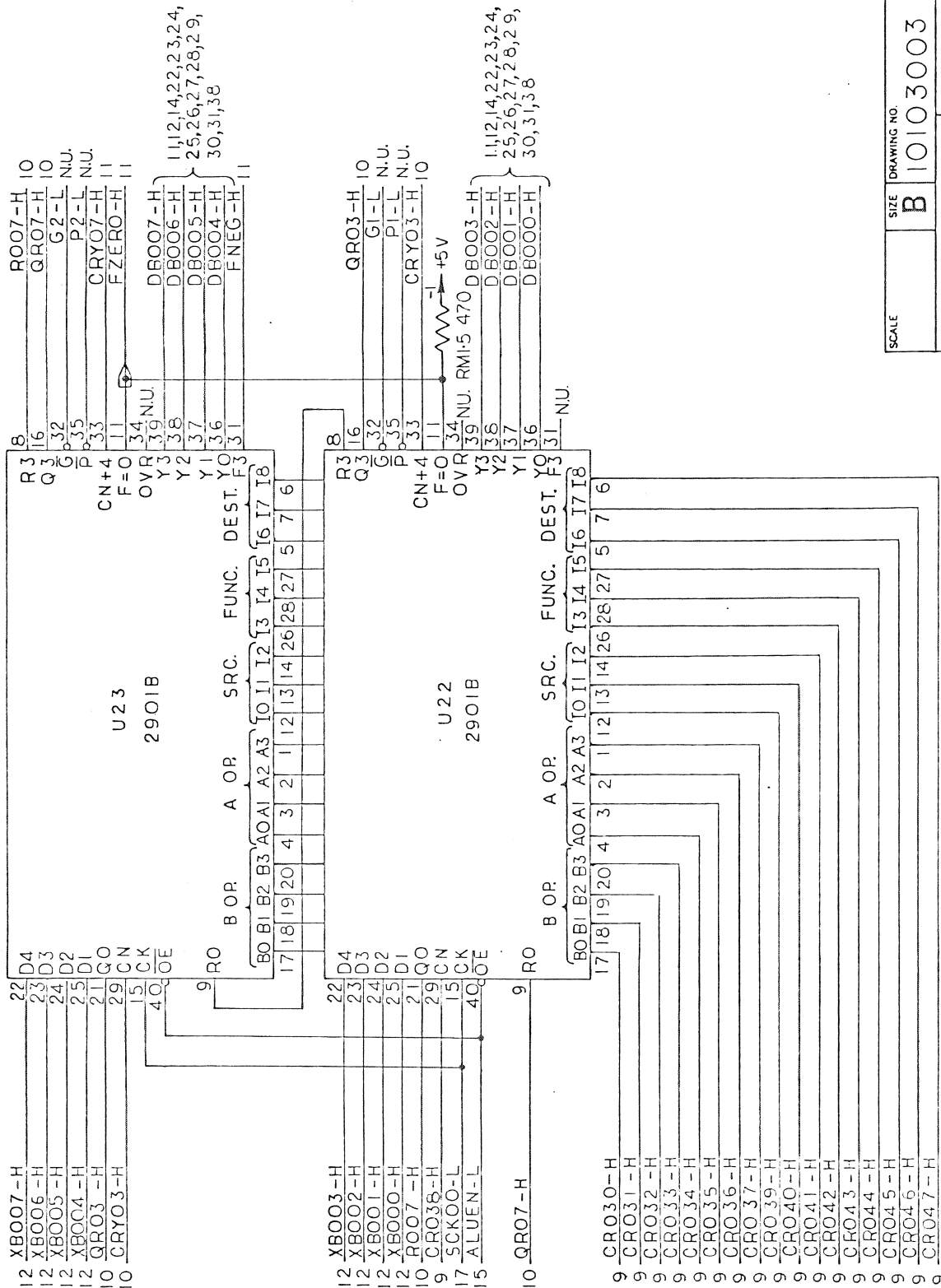
8	CM040 - H	3	UI11 Q
8	CM041 - H	4	D
8	CM042 - H	5	D
8	CM043 - H	6	D
8	CM044 - H	7	D
8	CM045 - H	8	D
8	CM046 - H	9	D
8	CM047 - H	10	D

CK OE

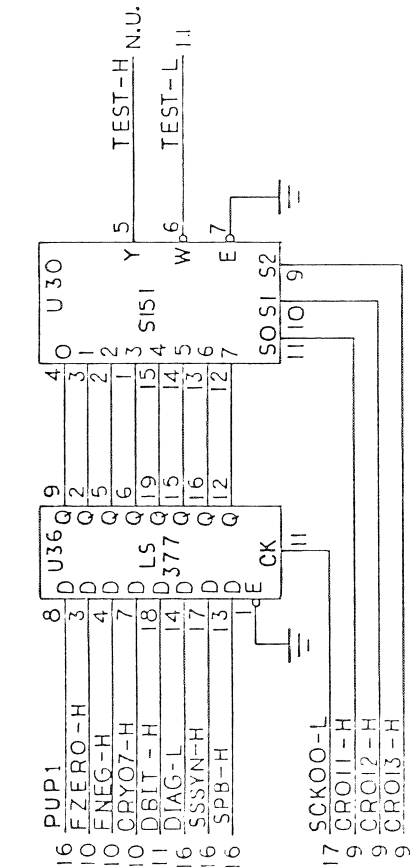
CONTROL REGISTER

MICROPROCESSOR

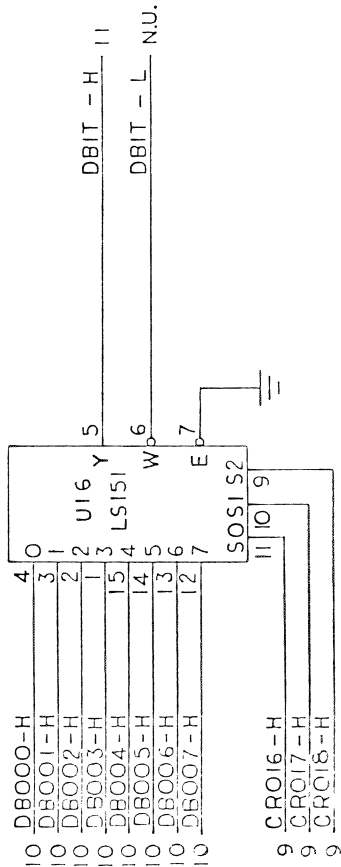
This document is the property of the company and is not to be distributed outside the company. It is to be used for the purpose of the project only. It is to be kept confidential and not to be used for any other purpose. It is to be kept in the company's files and not to be given to anyone else. It is to be kept in the company's files and not to be given to anyone else. It is to be kept in the company's files and not to be given to anyone else.



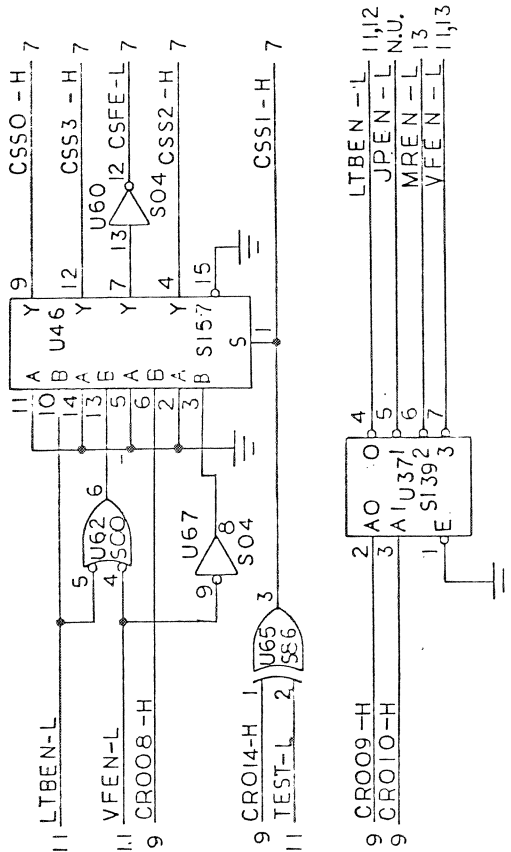
THE INFORMATION CONTAINED HEREIN IS THE PROPERTY OF
 THE UNITED STATES GOVERNMENT AND IS LOANED TO YOUR
 AGENCY FOR YOUR INFORMATION AND USE ONLY. IT IS TO BE
 RETURNED TO THE UNITED STATES GOVERNMENT AND NOT
 TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR
 BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING
 PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION
 STORAGE AND RETRIEVAL SYSTEM.



TEST REGISTER AND MUX

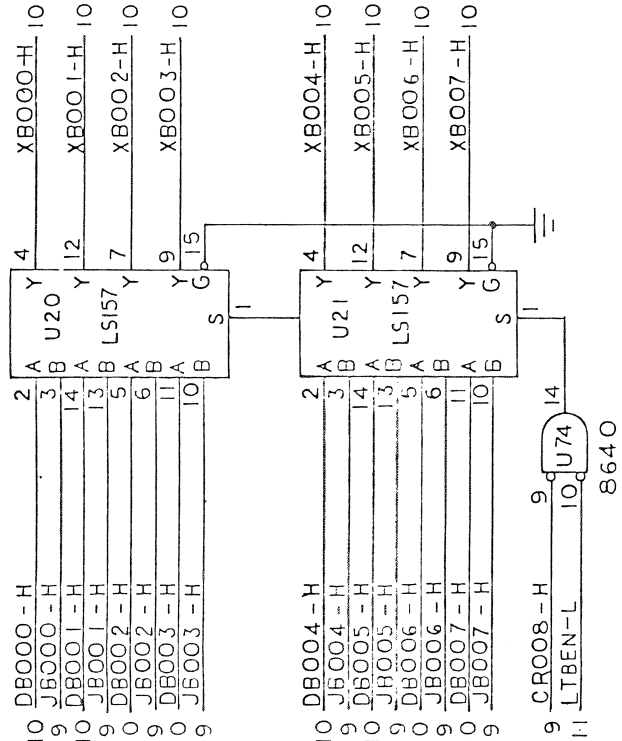
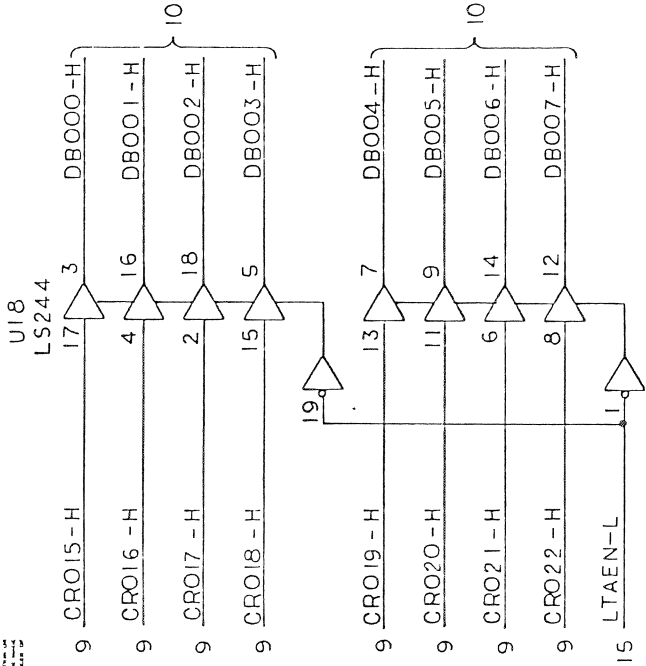


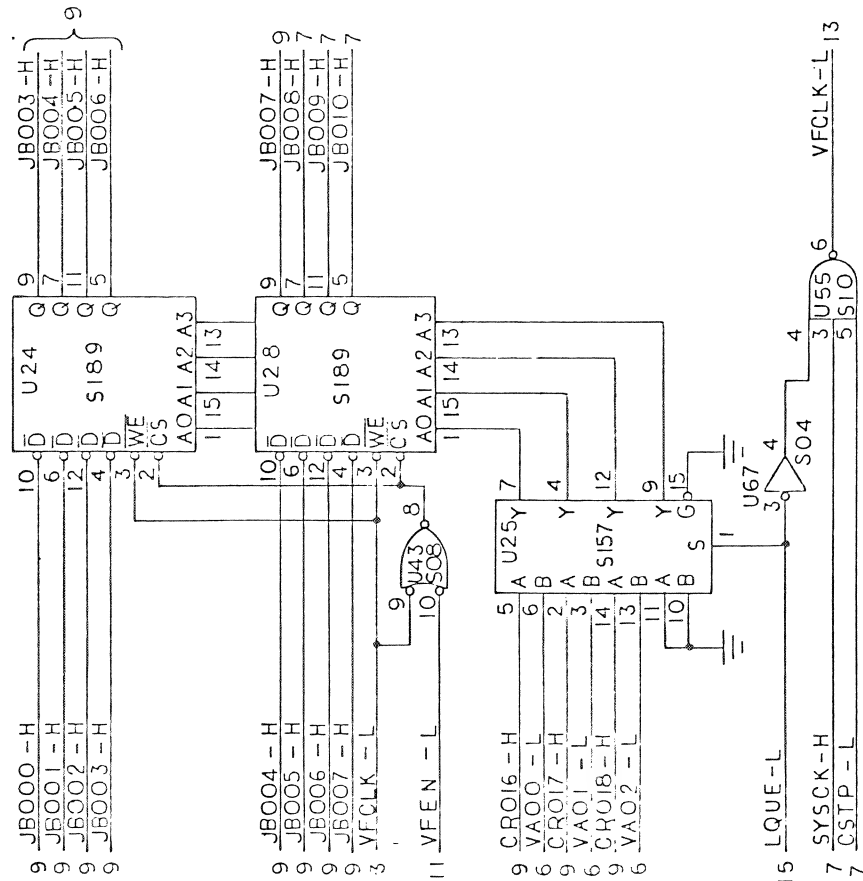
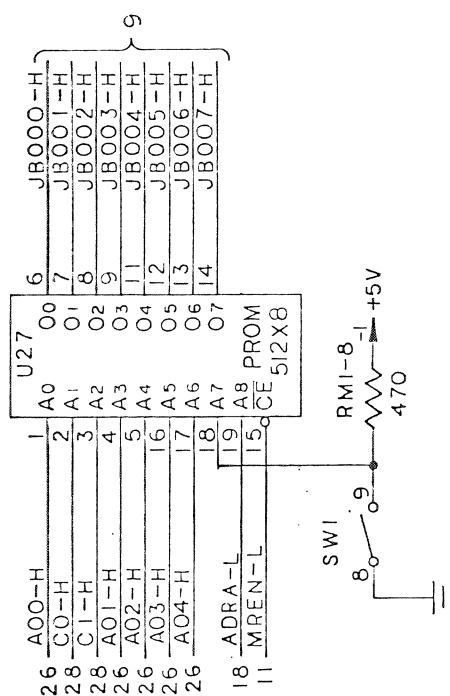
DATA BIT TEST

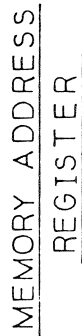


SEQUENCE CONTROL

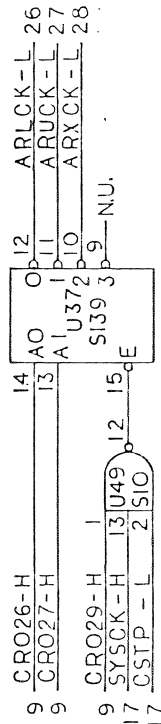
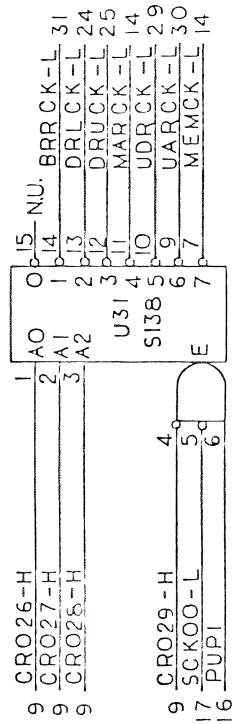
The information on this drawing is intended for use by the purchaser of the product and is not to be used for any other purpose without the written consent of the manufacturer. The manufacturer assumes no responsibility for the use of the product in any other manner than that for which it was designed.



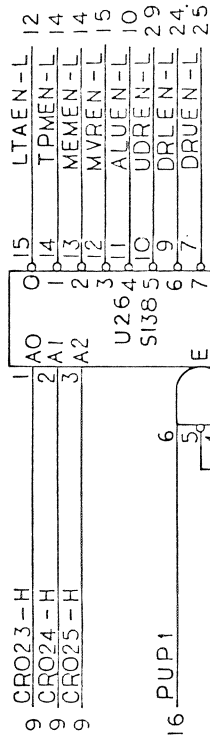




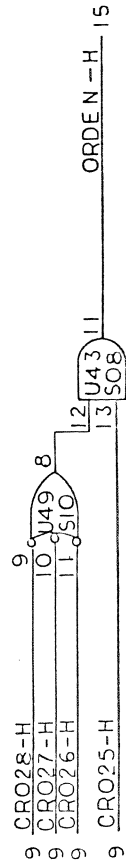
THIS DOCUMENT CONTAINS INFORMATION OF THE PROPERTY OF
THE UNITED STATES GOVERNMENT AND IS NOT TO BE
REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY
MEANS, ELECTRONIC OR MECHANICAL, INCLUDING
PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION
STORAGE AND RETRIEVAL SYSTEM, WITHOUT PERMISSION
IN WRITING FROM THE NATIONAL BUREAU OF STANDARDS



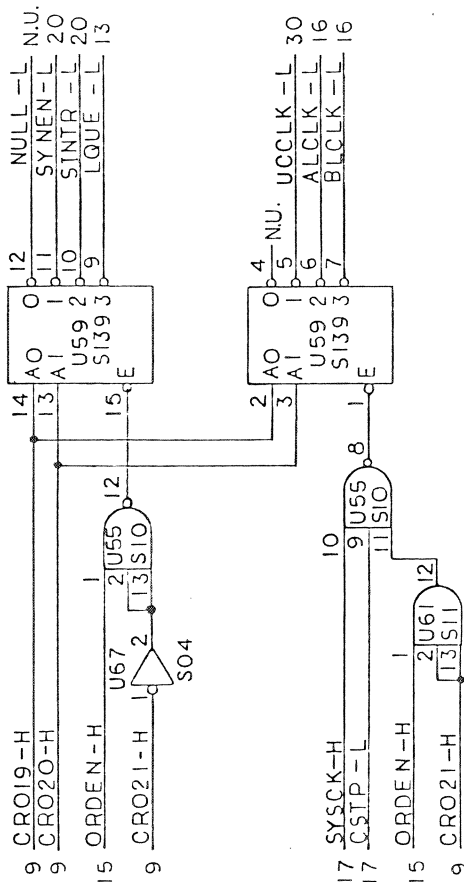
DESTINATION CLOCKS



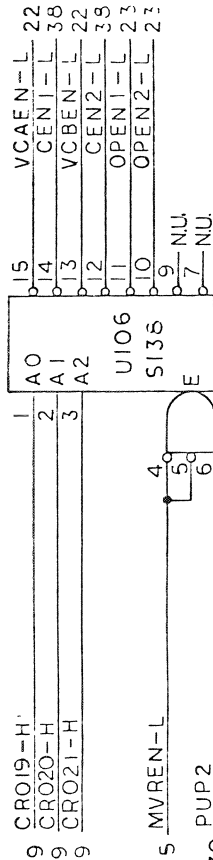
SOURCE ENABLES



ORDER ENABLES

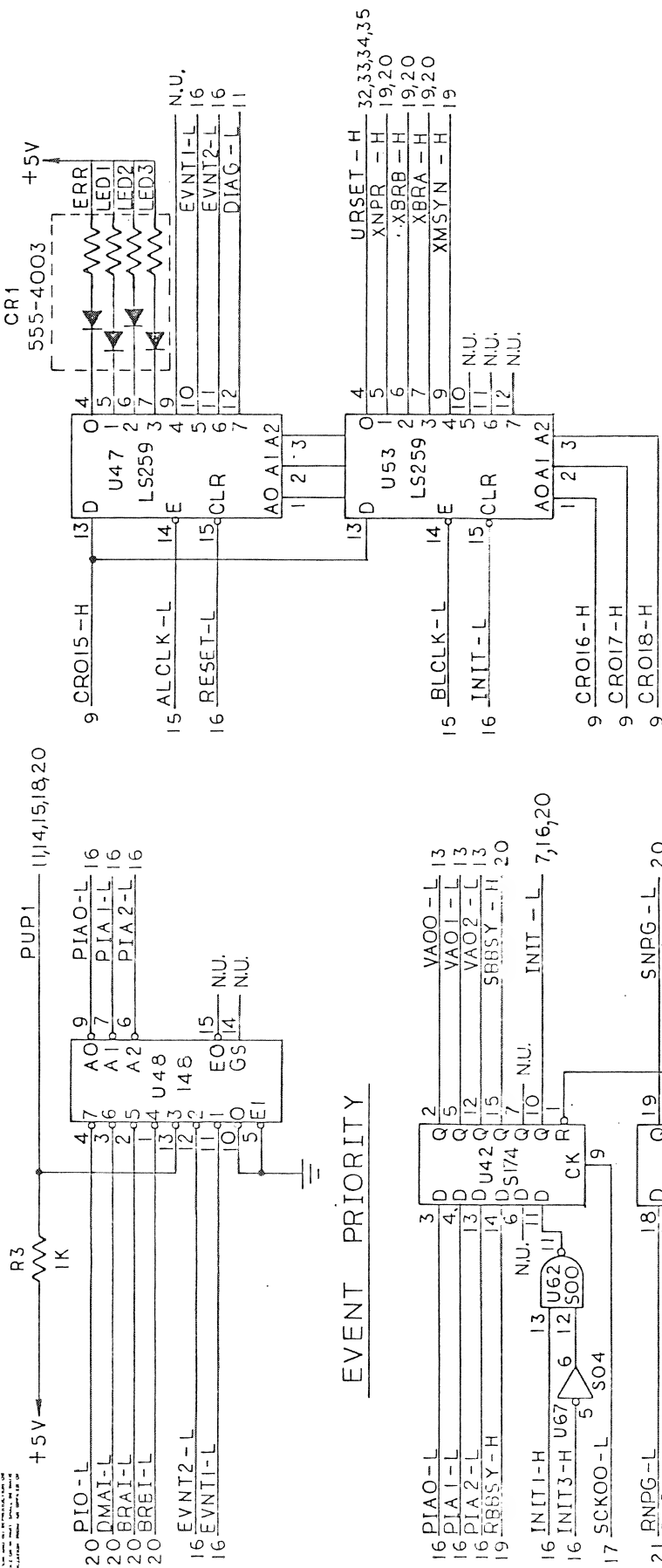


ORDER DECODE



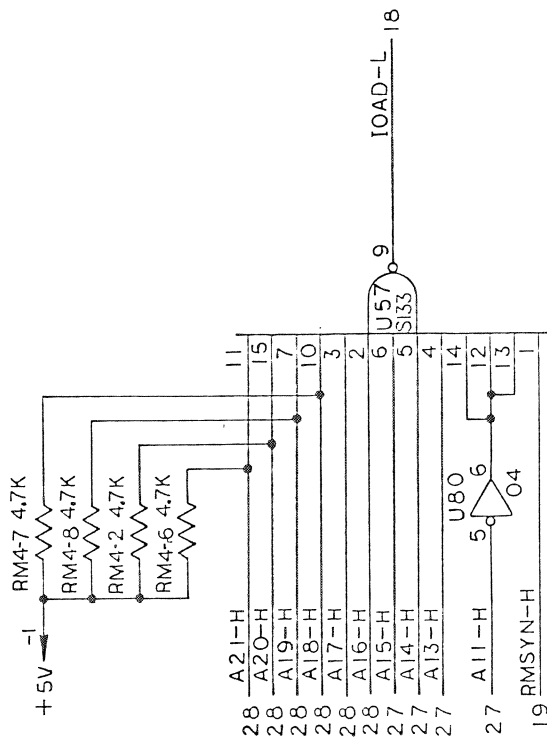
VECTOR AND CARRIER ENABLES

THE INFORMATION CONTAINED HEREIN IS UNCLASSIFIED EXCEPT WHERE SHOWN OTHERWISE. IT IS THE PROPERTY OF THE UNITED STATES GOVERNMENT AND IS LOANED TO YOUR AGENCY. IT AND ITS CONTENTS ARE NOT TO BE DISTRIBUTED OUTSIDE YOUR AGENCY. THIS DOCUMENT IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM, WITHOUT PERMISSION IN WRITING FROM THE NATIONAL BUREAU OF STANDARDS.

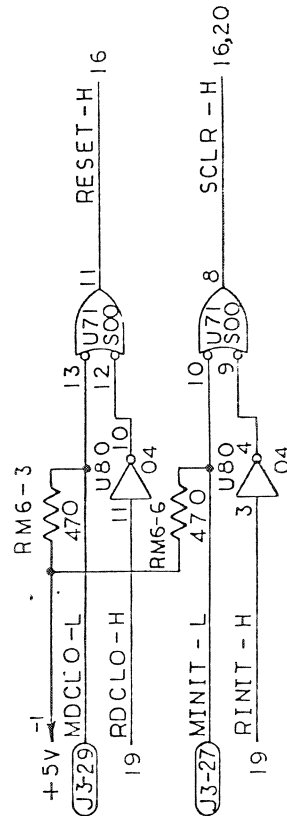


A AND B LATCHES

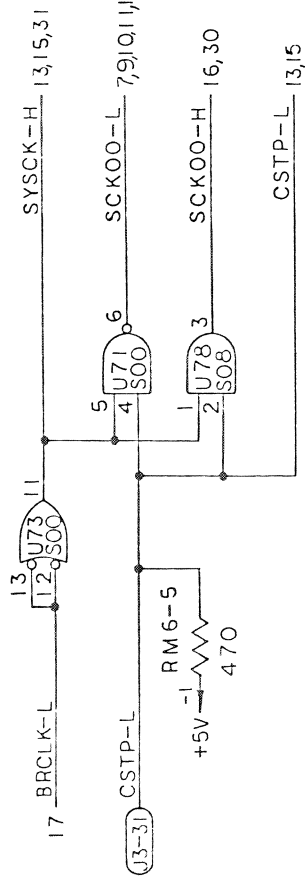
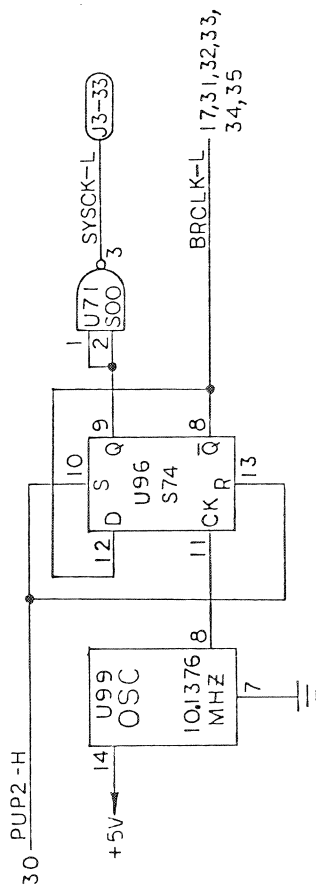
THIS DRAWING IS THE PROPERTY OF THE COMPANY AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM, WITHOUT THE WRITTEN PERMISSION OF THE COMPANY.



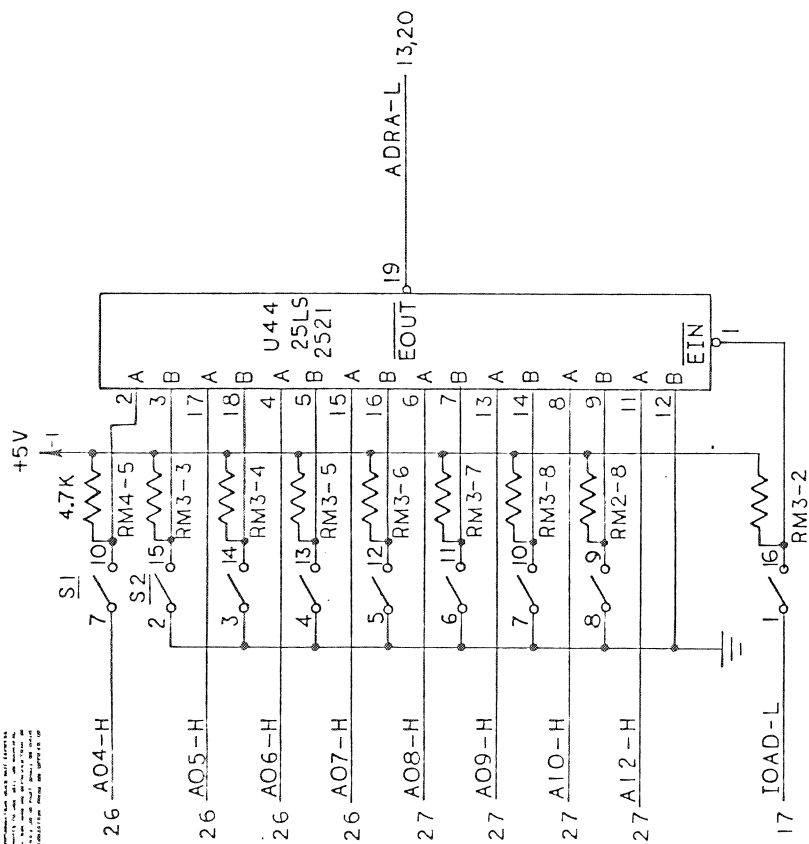
I/O ADDRESS DETECT



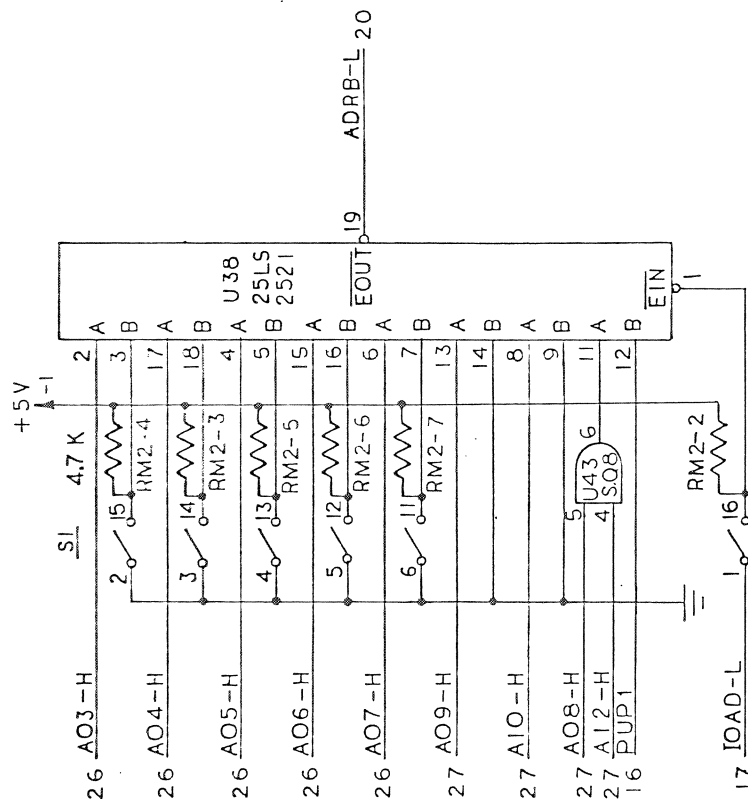
RESET AND SOFT CLEAR



CLOCKS

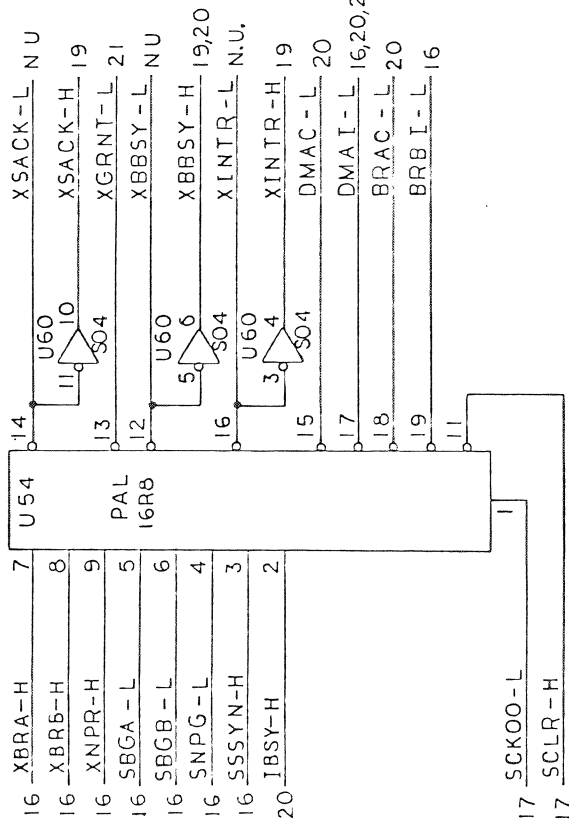


ADDRESS SELECT A

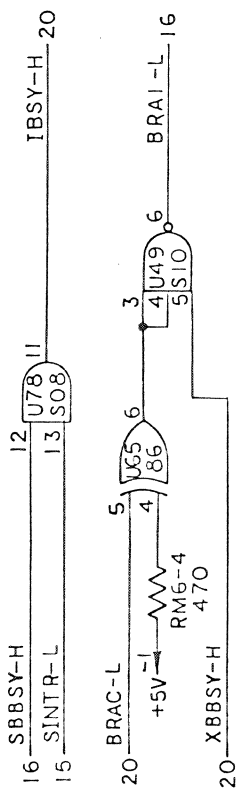


ADDRESS SELECT B

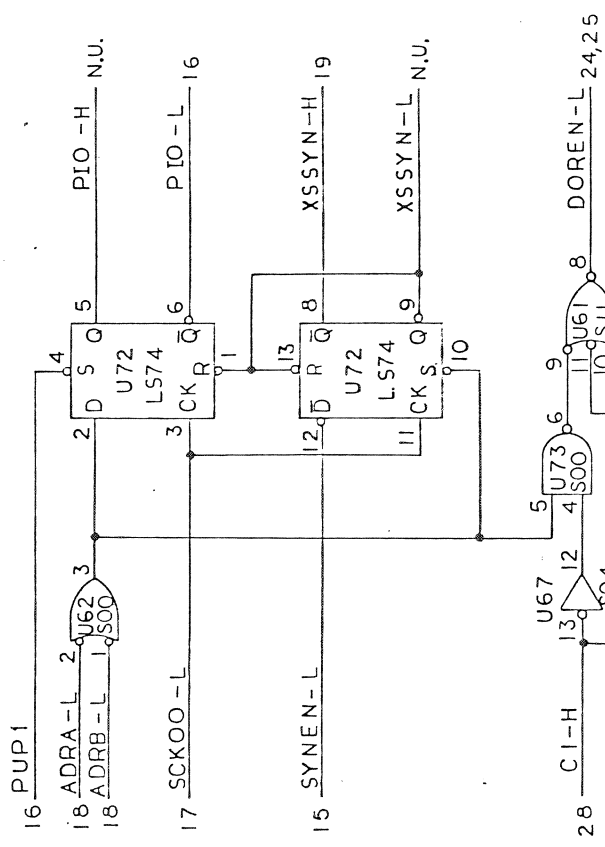
THIS DRAWING IS THE PROPERTY OF THE COMPANY AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM, WITHOUT THE WRITTEN PERMISSION OF THE COMPANY.



BUS CONTROLLER



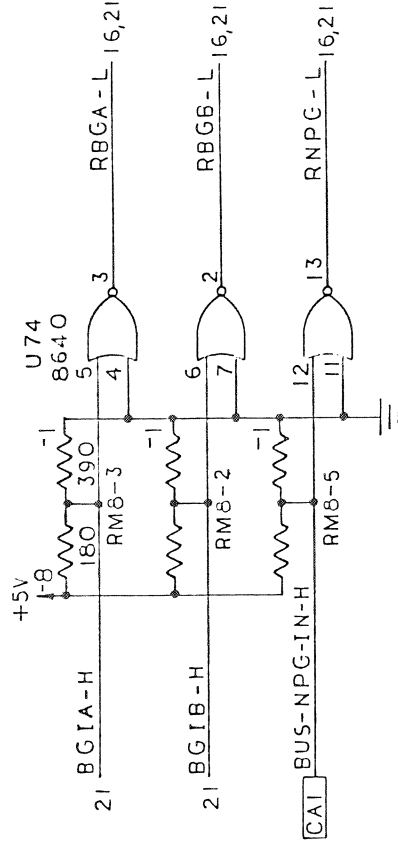
BUS CONTROL



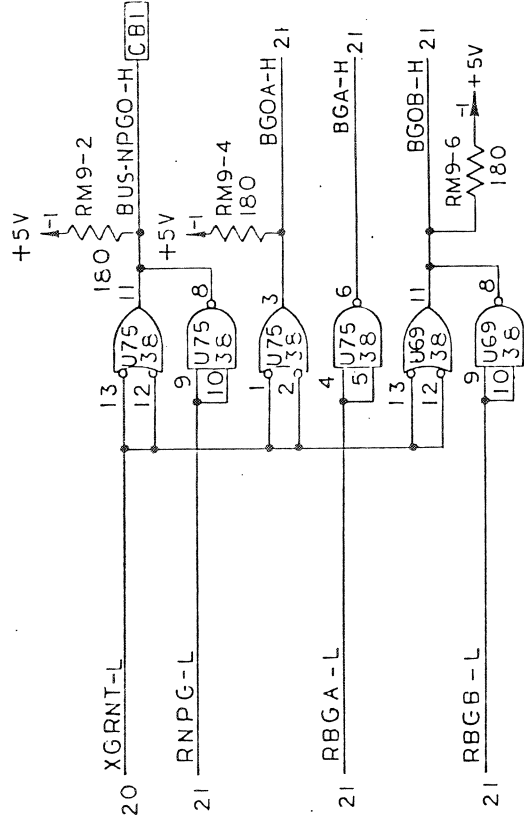
THIS DRAWING IS THE PROPERTY OF BENTON & BOWLES
 AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM, WITHOUT THE WRITTEN PERMISSION OF BENTON & BOWLES.

21	BGOA-H	18	3	BGIB-H	21
21	BGOB-H	1	7	BGIA-H	21
21	BGA-H	5	2	BUS-BG4-OUT-H	DT2
21	BUS-BG4-IN-H	4	6	BG5-OUT-H	DN2
DS2	BG5-IN-H	8	10	BG6-OUT-H	DN2
DP2	BG6-IN-H	9	12	BUS-BG7-OUT-H	DL2
DM2	BG7-IN-H	11	14	BUS-GR4-L	DH2
DK2	GRB-L	13	16	BUS-BR5-L	DF2
19	BUS-BRA-L	15	17	BUS-BR6-L	DE2

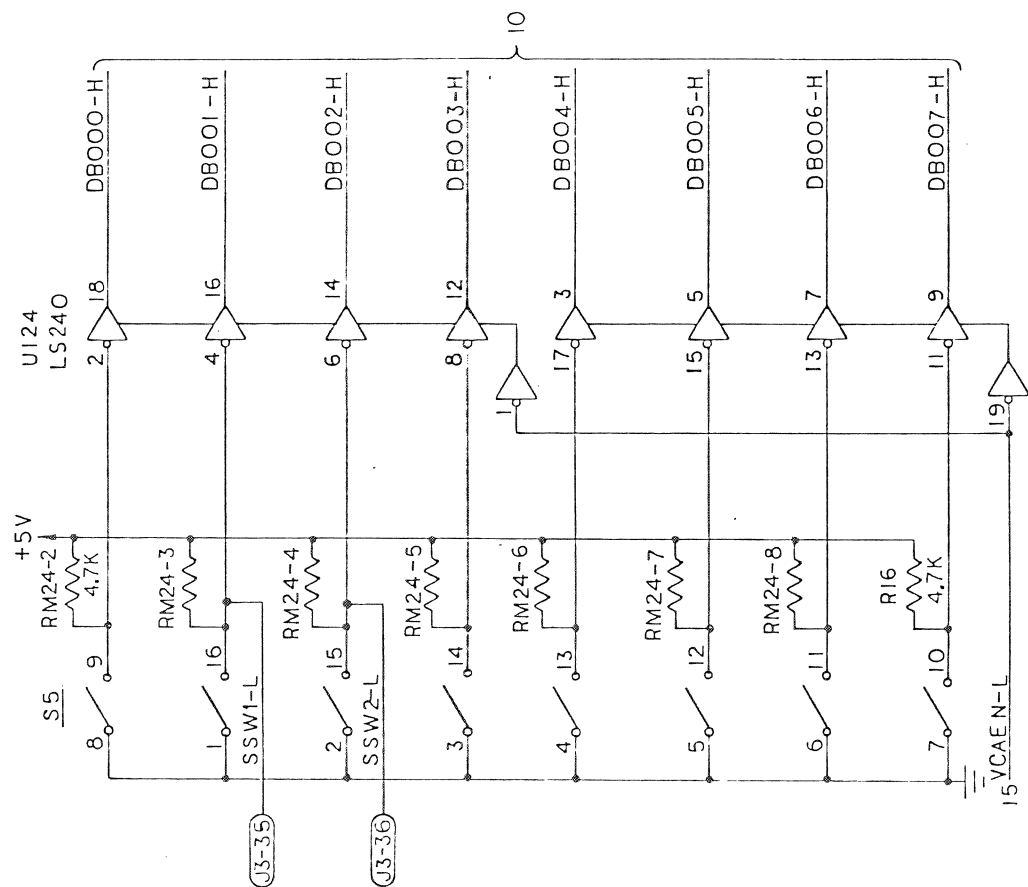
INTERRUPT LEVEL SELECTION



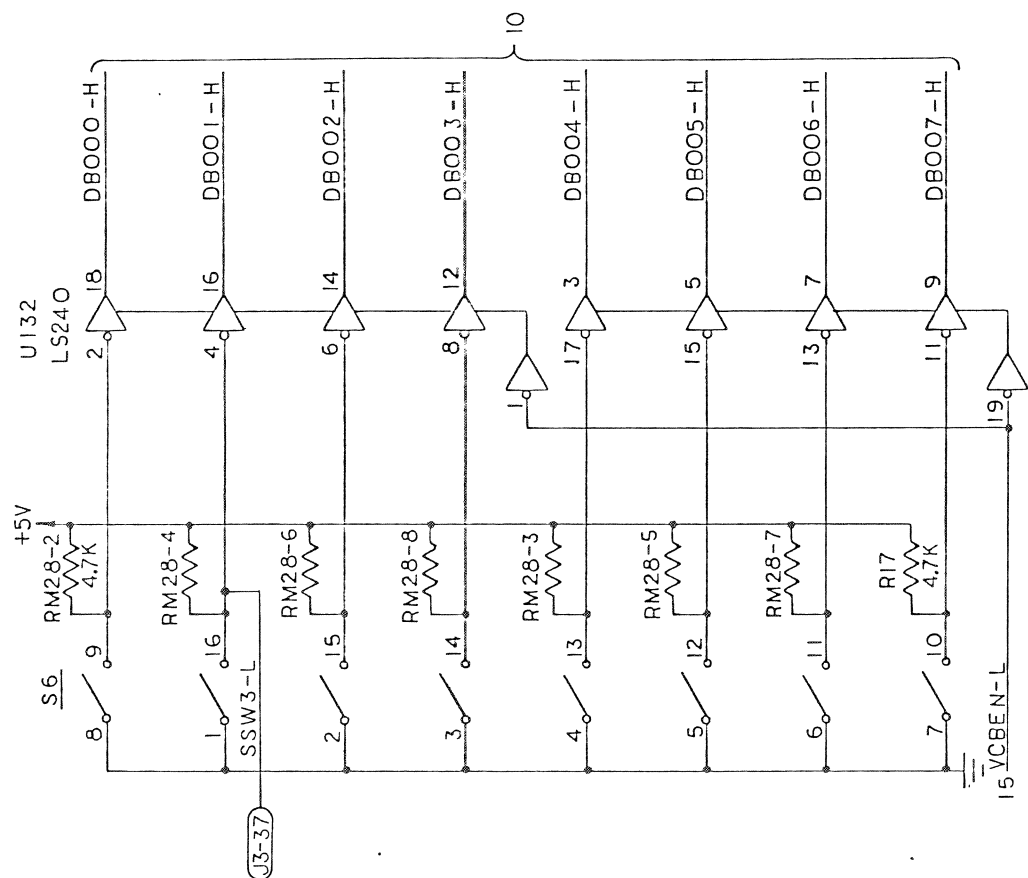
GRANT BUS RECEIVERS



GRANT BUS DRIVERS

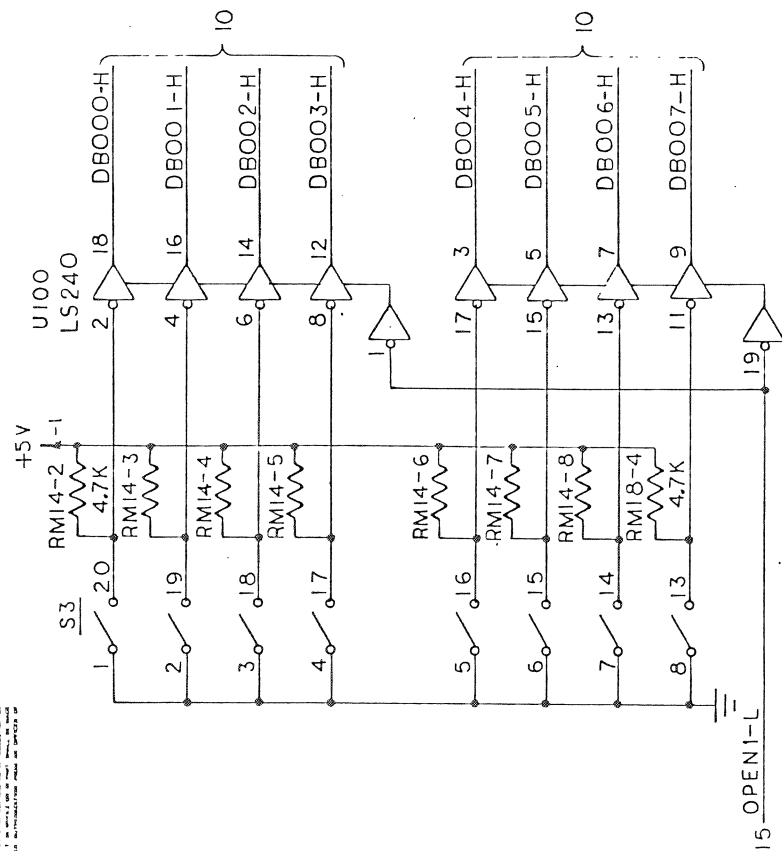


VECTOR A

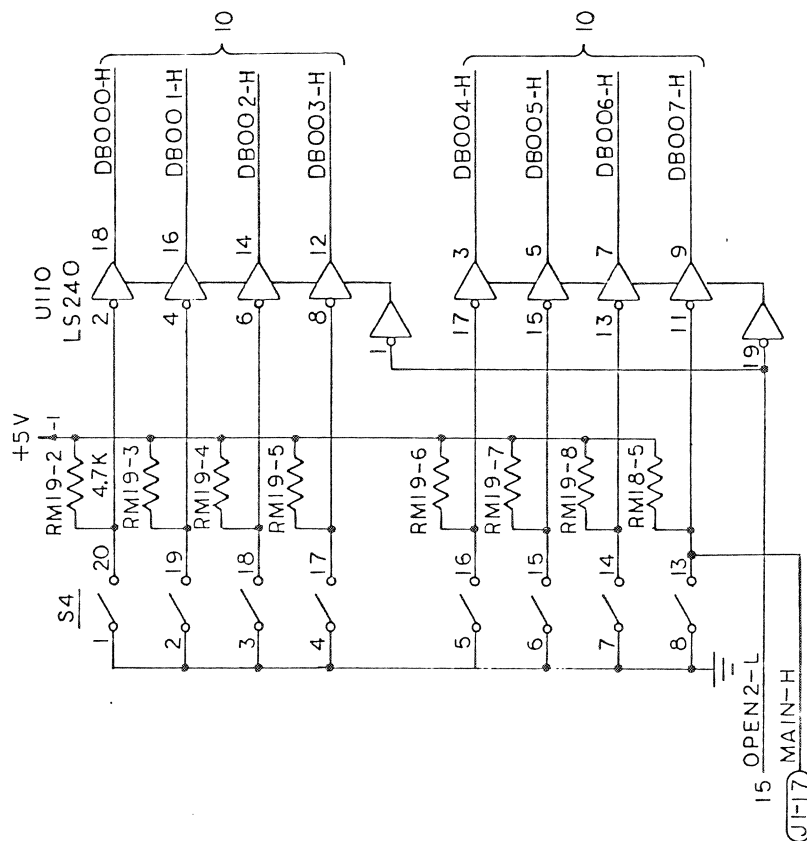
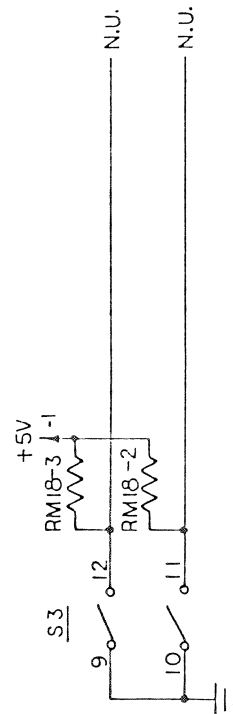


VECTOR B

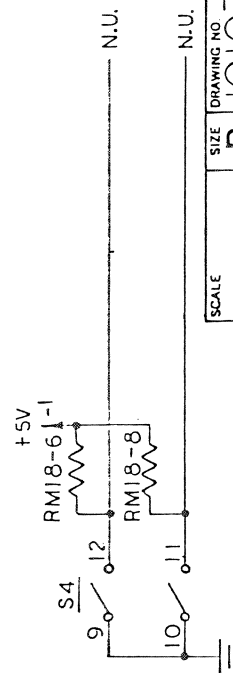
ALL DIMENSIONS ARE IN INCHES UNLESS OTHERWISE SPECIFIED.
 DIMENSIONS ARE GIVEN IN PARENTHESES FOLLOWING THE DIMENSION LINE.
 DIMENSIONS ARE GIVEN IN PARENTHESES FOLLOWING THE DIMENSION LINE.
 DIMENSIONS ARE GIVEN IN PARENTHESES FOLLOWING THE DIMENSION LINE.



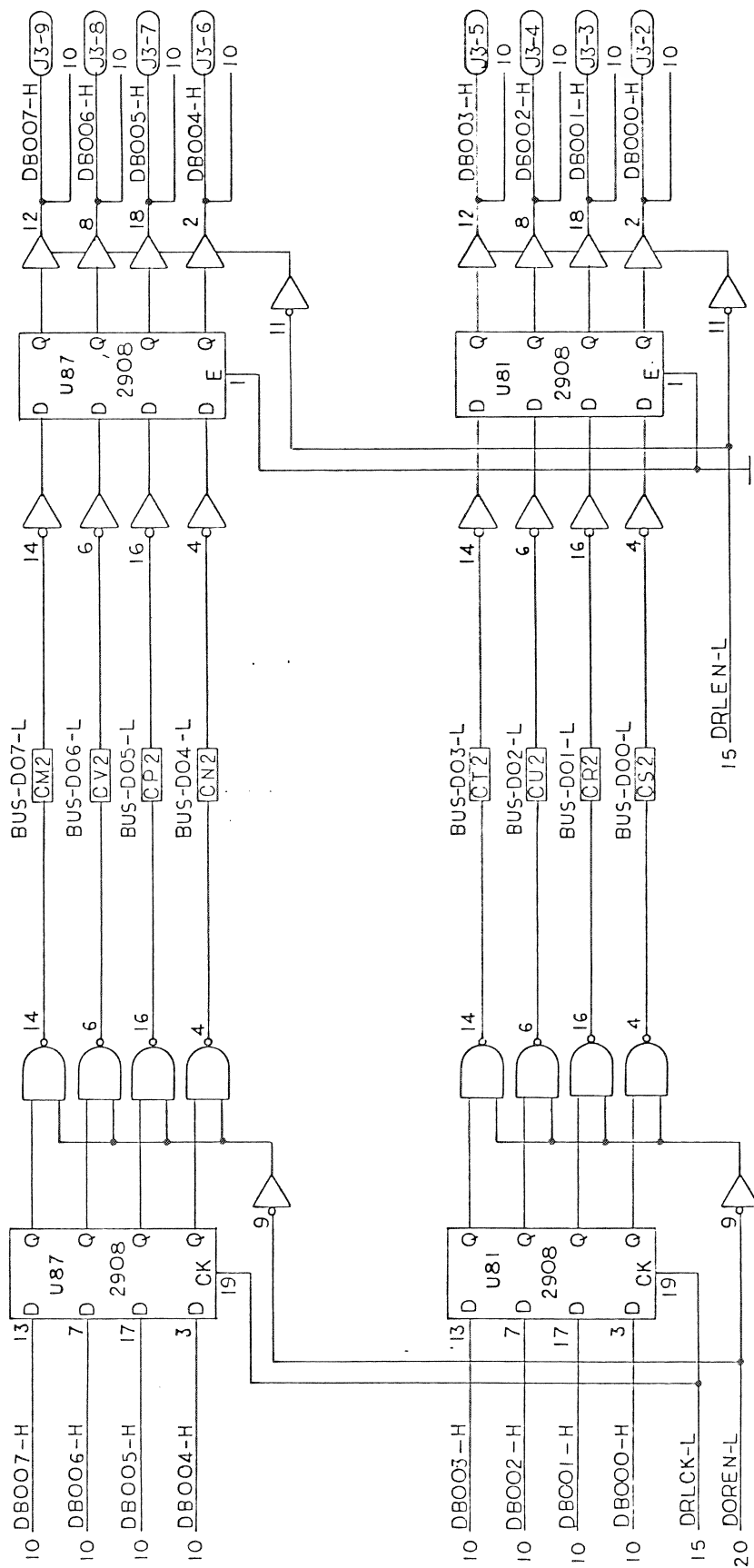
OPTION SWITCHES GROUP 1



OPTION SWITCHES - GROUP 2



The information on this drawing is the property of
 the company and is to be kept confidential.
 It is to be used only for the purpose for which it was
 created. The company assumes no responsibility for
 errors or omissions. The company reserves the right to
 change the design without notice.



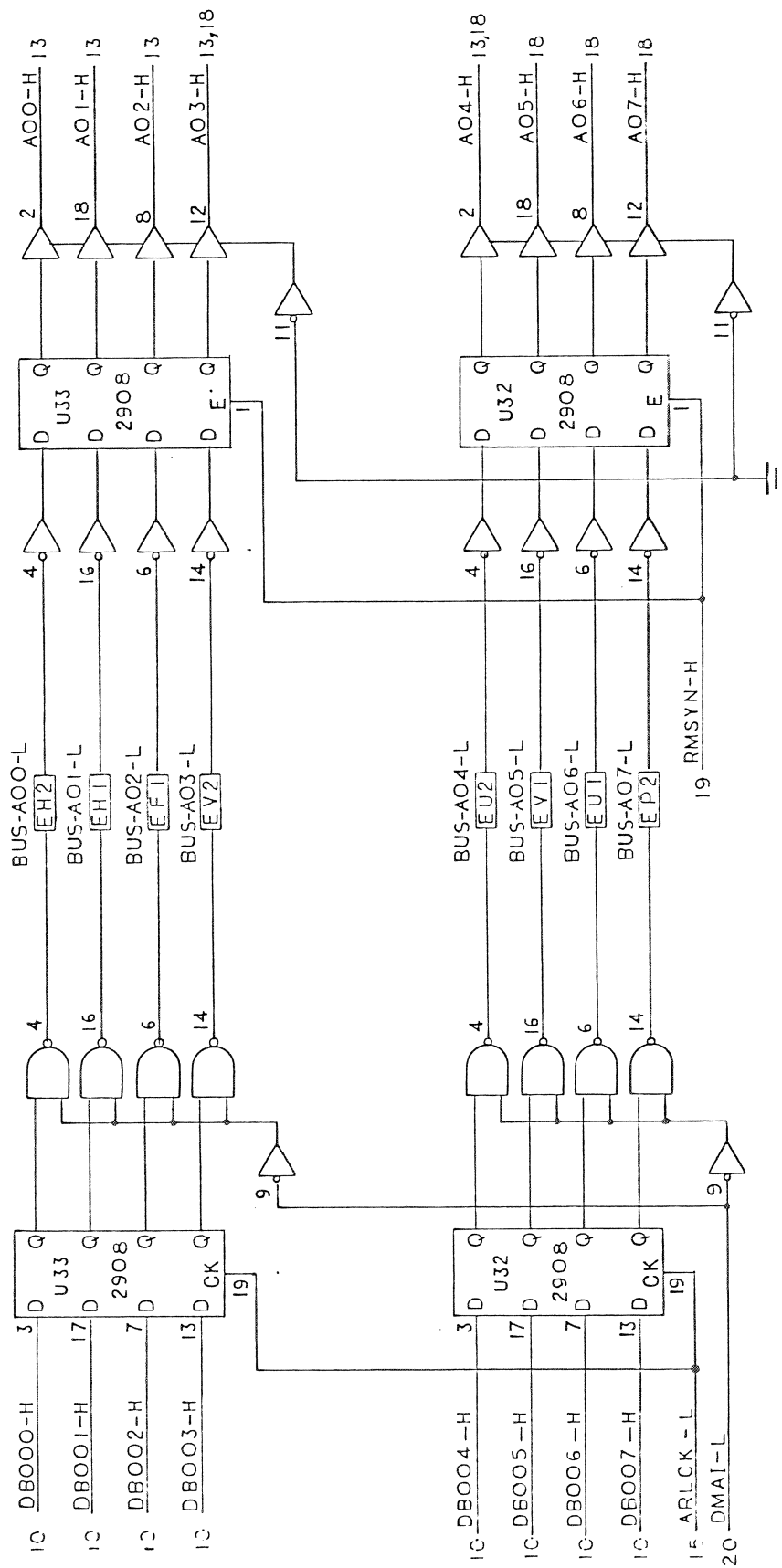
DATA INPUT REGISTER

LOW BYTE

DATA OUTPUT REGISTER

LOW BYTE

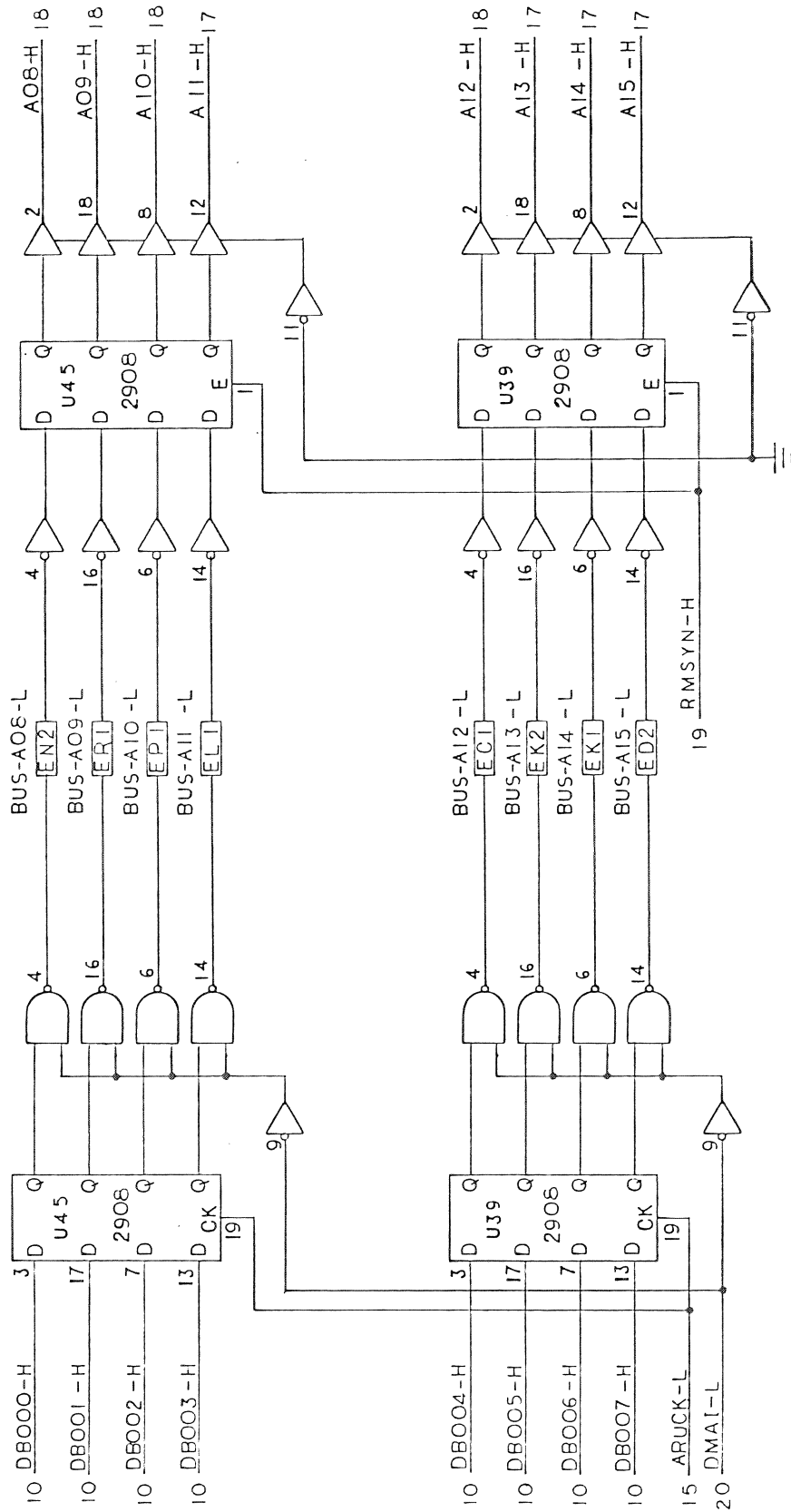
See Appendix A for pin connections to the ICs. The ICs are shown in the schematic diagram with their pin numbers. The ICs are shown in the schematic diagram with their pin numbers. The ICs are shown in the schematic diagram with their pin numbers.



ADDRESS INPUT LATCH

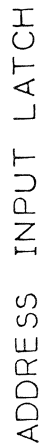
ADDRESS OUTPUT REGISTER

Alle Angaben sind ohne Gewähr. Die Firma übernimmt keine Haftung für Schäden, die aus dem Gebrauch der Bauteile resultieren. Die Firma ist nicht verantwortlich für Schäden, die aus dem Gebrauch der Bauteile resultieren. Die Firma ist nicht verantwortlich für Schäden, die aus dem Gebrauch der Bauteile resultieren.

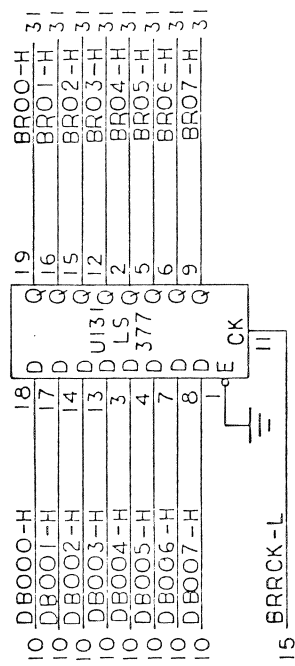


ADDRESS OUTPUT REGISTER

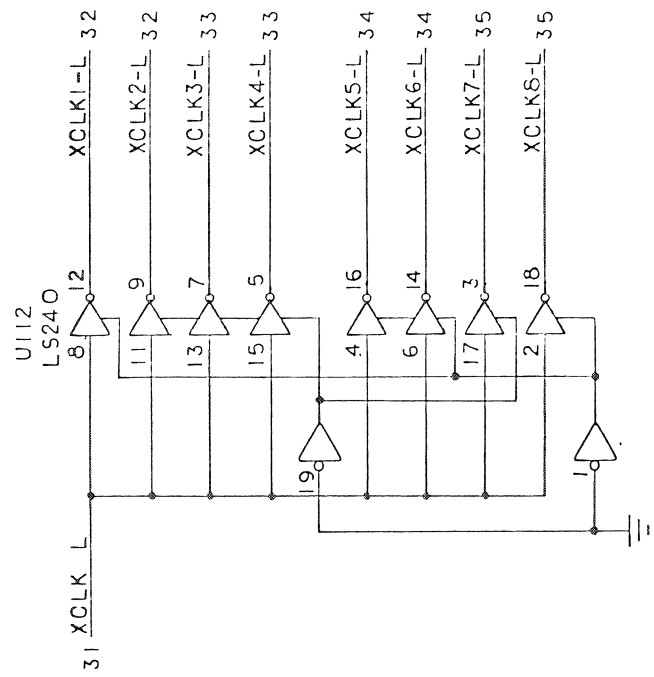
ADDRESS INPUT LATCH



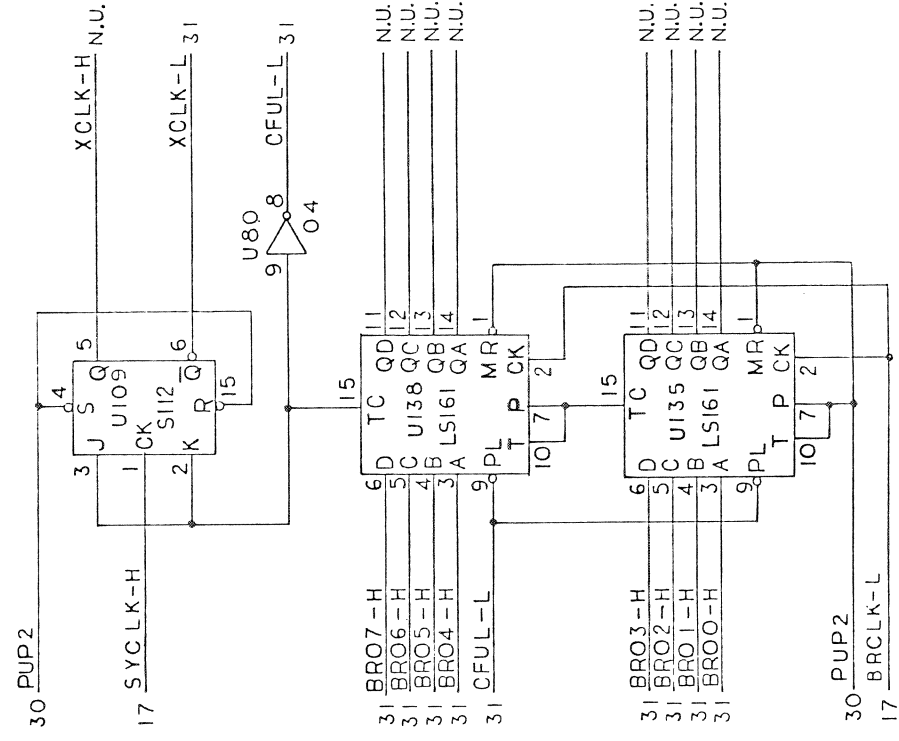
ADDRESS OUTPUT REGISTER



EXT. BAUD RATE REGISTER

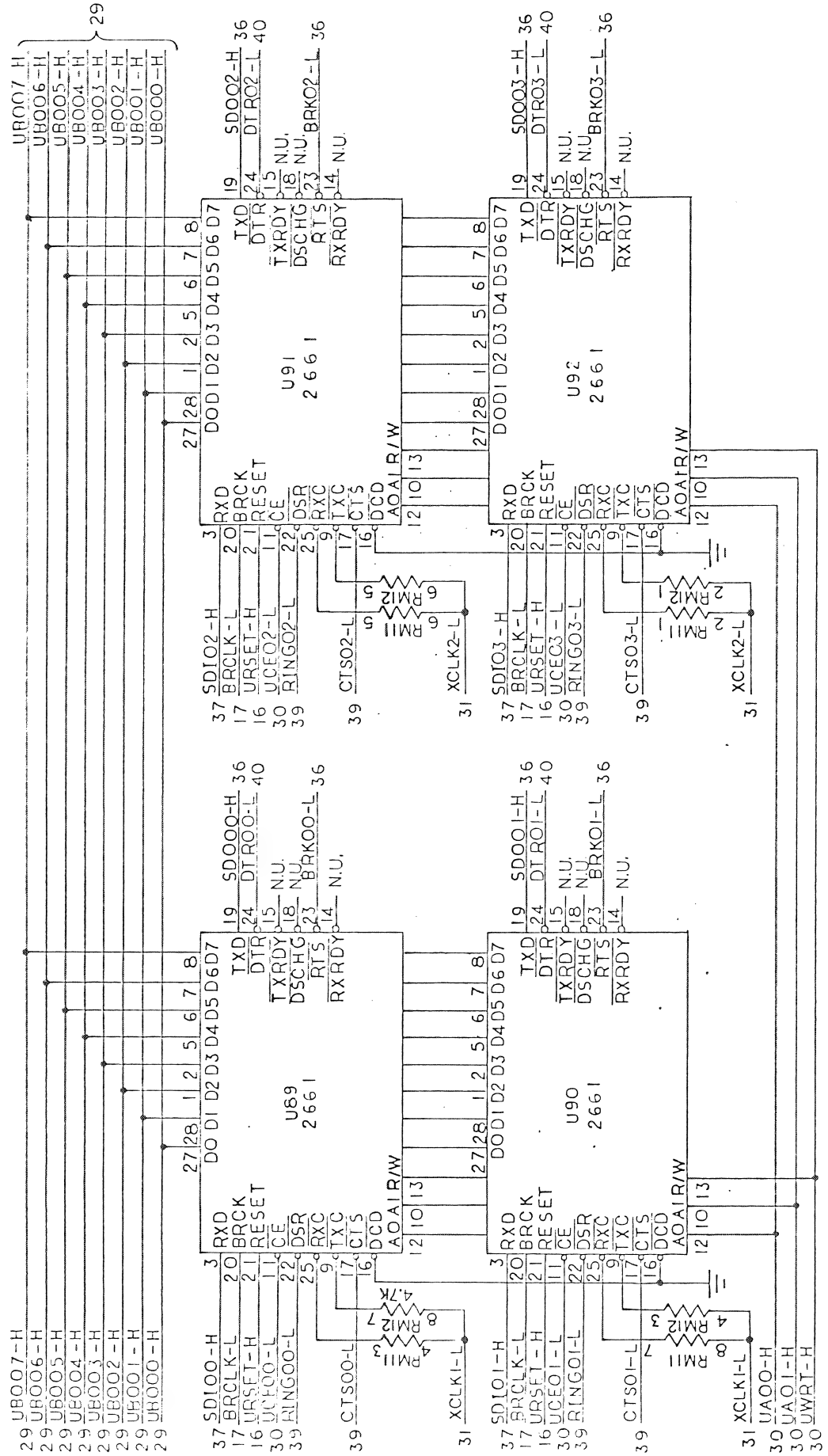


EXT. CLOCK DRIVER



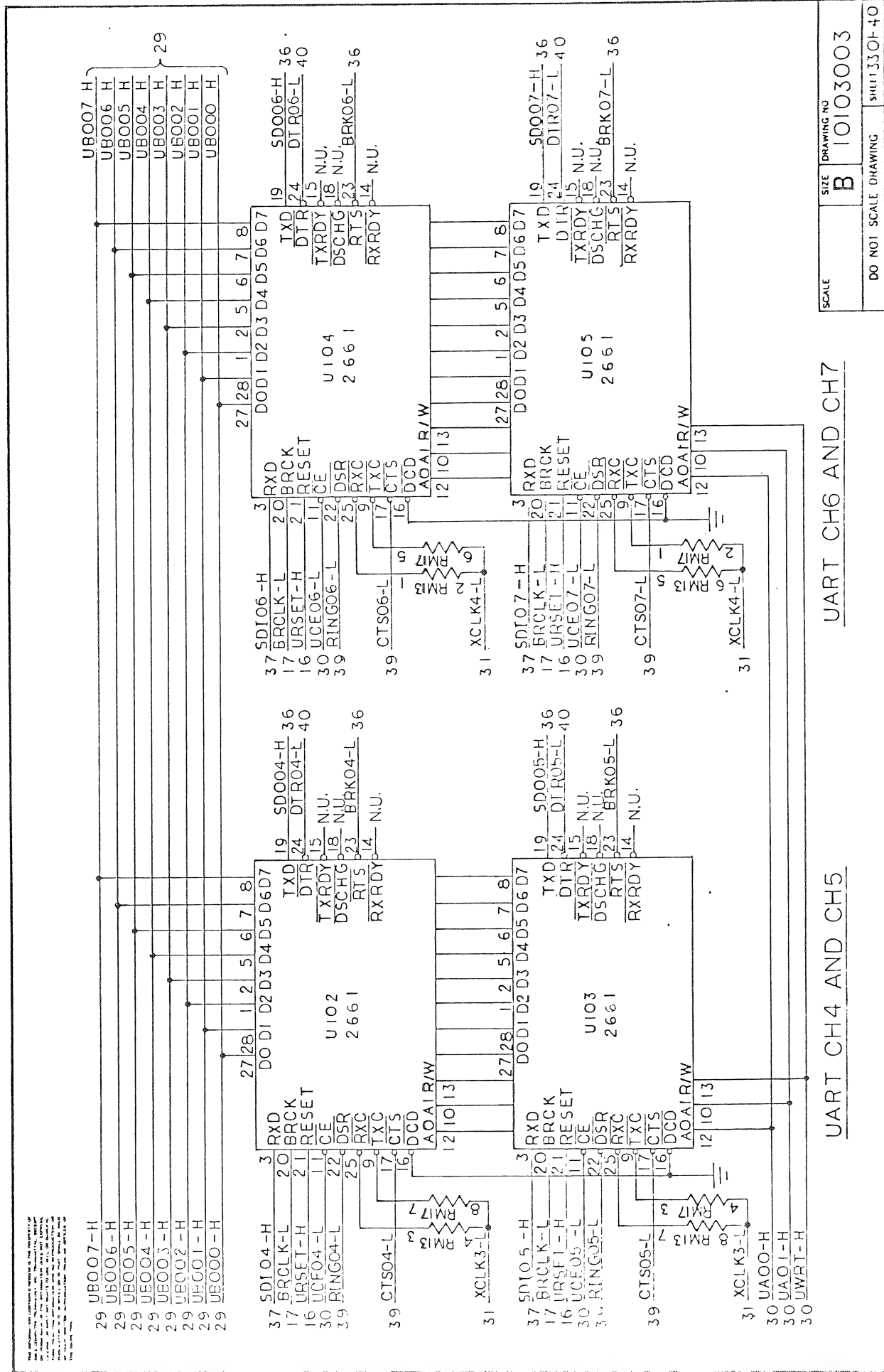
UART EXT. CLOCK GENERATOR

THE INFORMATION CONTAINED HEREIN IS THE PROPERTY OF
MICROELECTRONICS CORPORATION. IT IS TO BE USED FOR
THE PURPOSES OF THE SPECIFIC DESIGN AND NOT BE
REPRODUCED OR TRANSMITTED IN ANY FORM OR BY
ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING
PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION
STORAGE AND RETRIEVAL SYSTEM, WITHOUT PERMISSION
IN WRITING FROM MICROELECTRONICS CORPORATION.

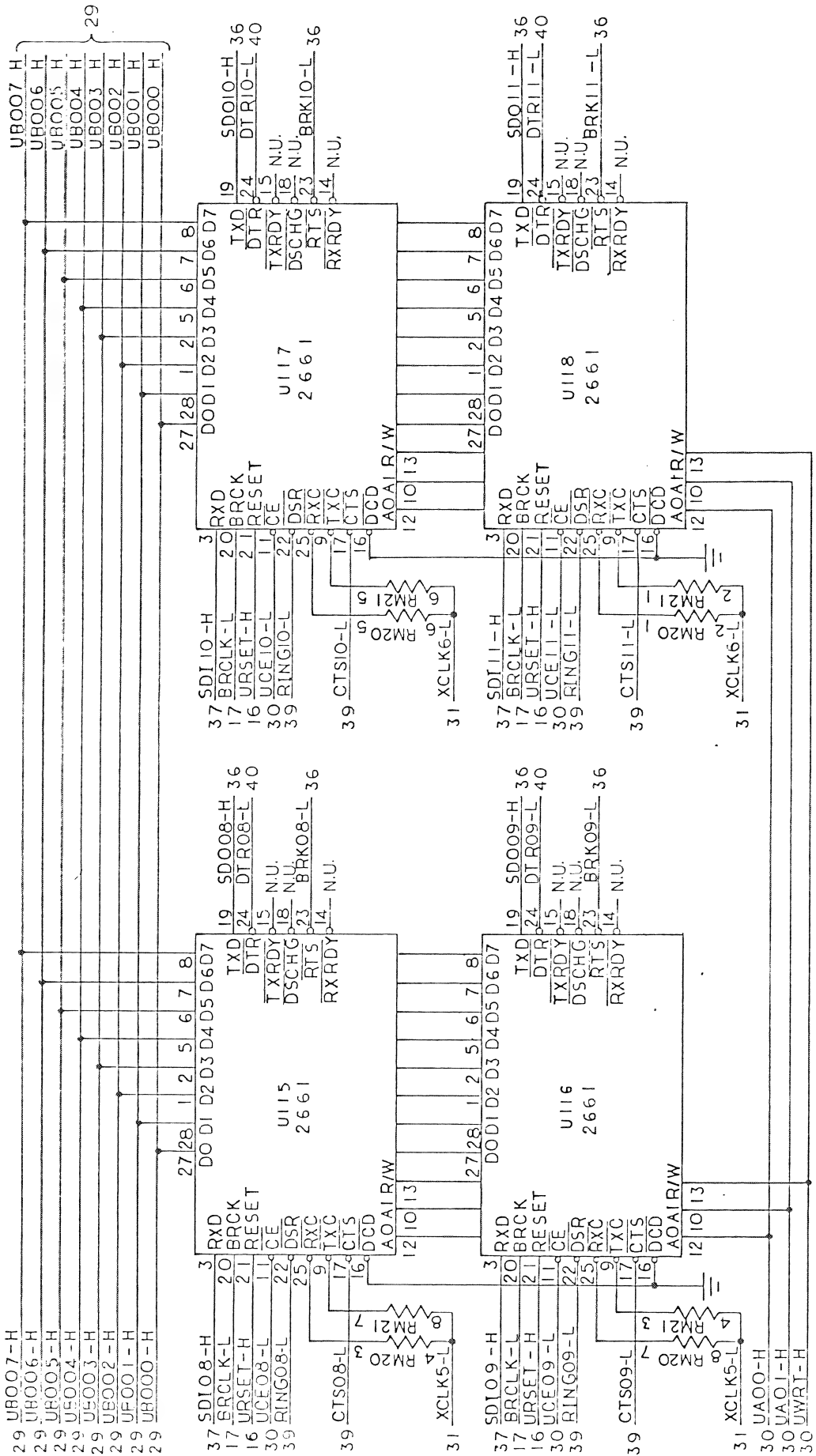


UART CHO AND CHI

UART CH2 AND CH3

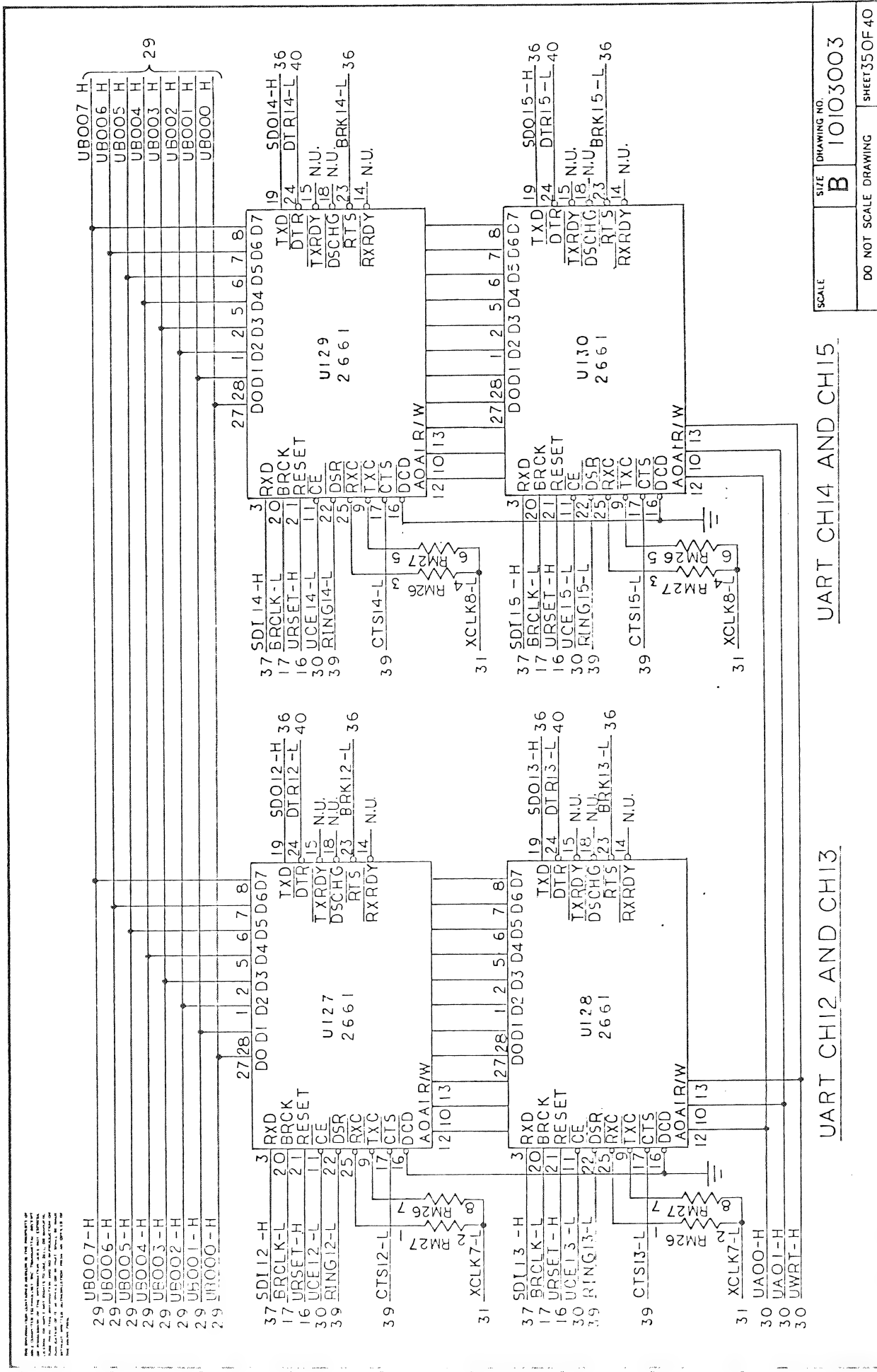


THE INFORMATION CONTAINED HEREIN IS THE PROPERTY OF
 THE UNITED STATES GOVERNMENT AND IS LOANED TO YOU
 BY THE NATIONAL BUREAU OF STANDARDS. IT IS TO BE
 USED FOR THE PURPOSES SPECIFIED IN THE REQUEST FOR
 INFORMATION. IT IS NOT TO BE DISTRIBUTED OUTSIDE
 YOUR AGENCY WITHOUT THE WRITTEN PERMISSION OF
 THE NATIONAL BUREAU OF STANDARDS.

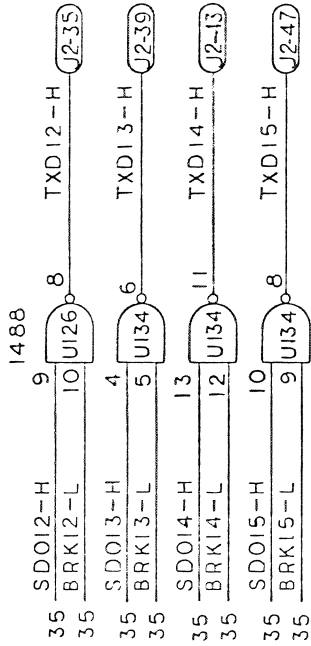
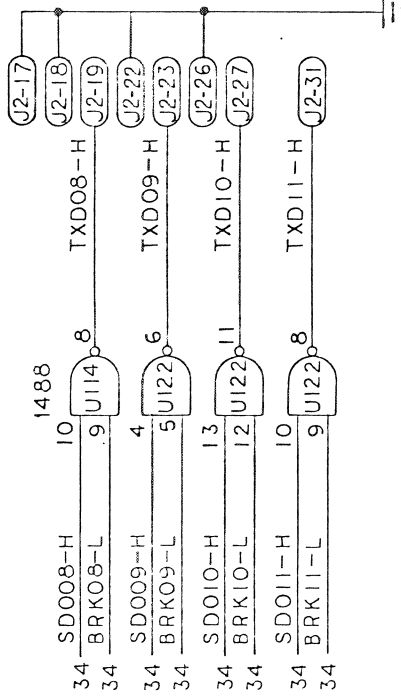
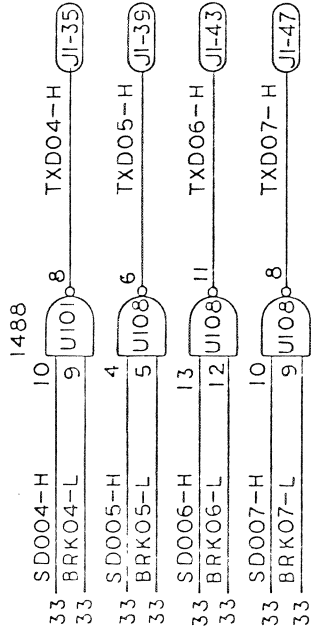
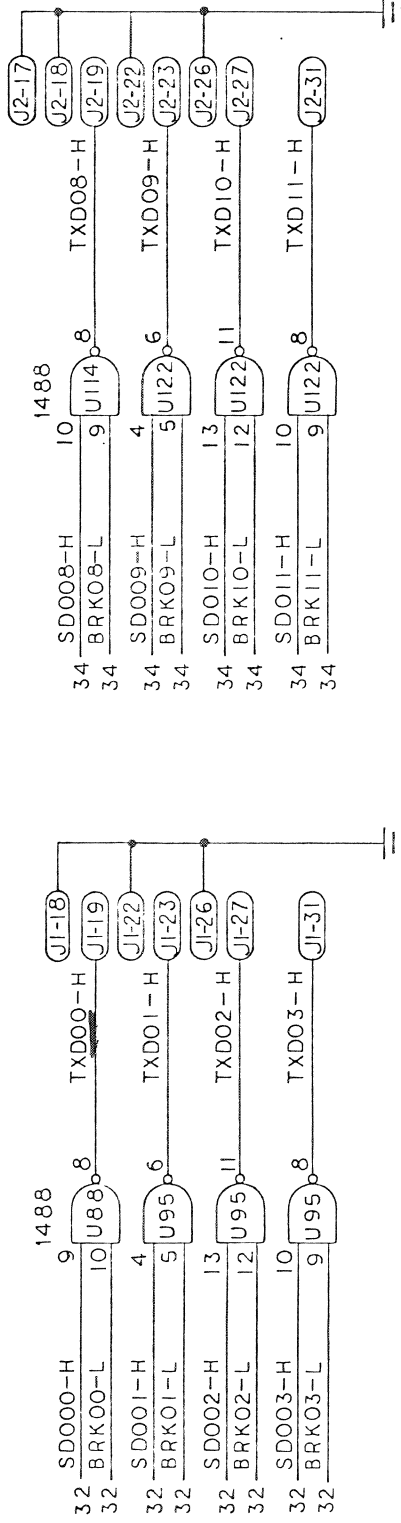


UART CH8 AND CH9

UART CIO AND CH11

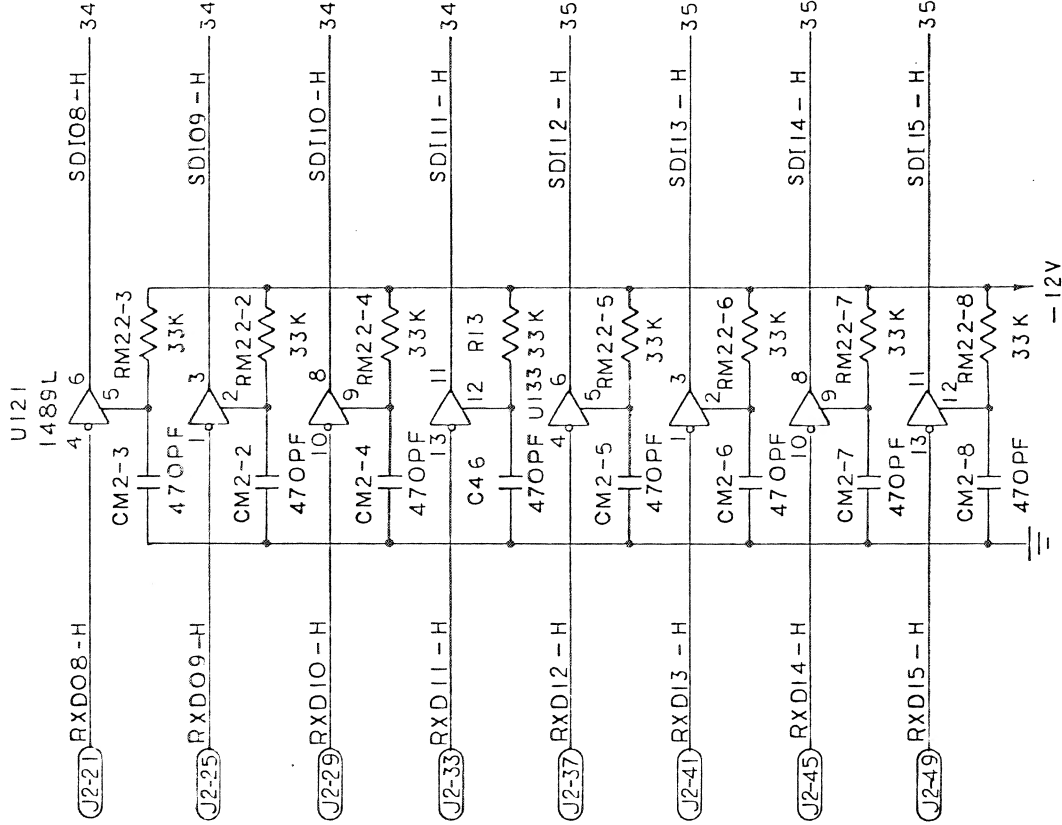
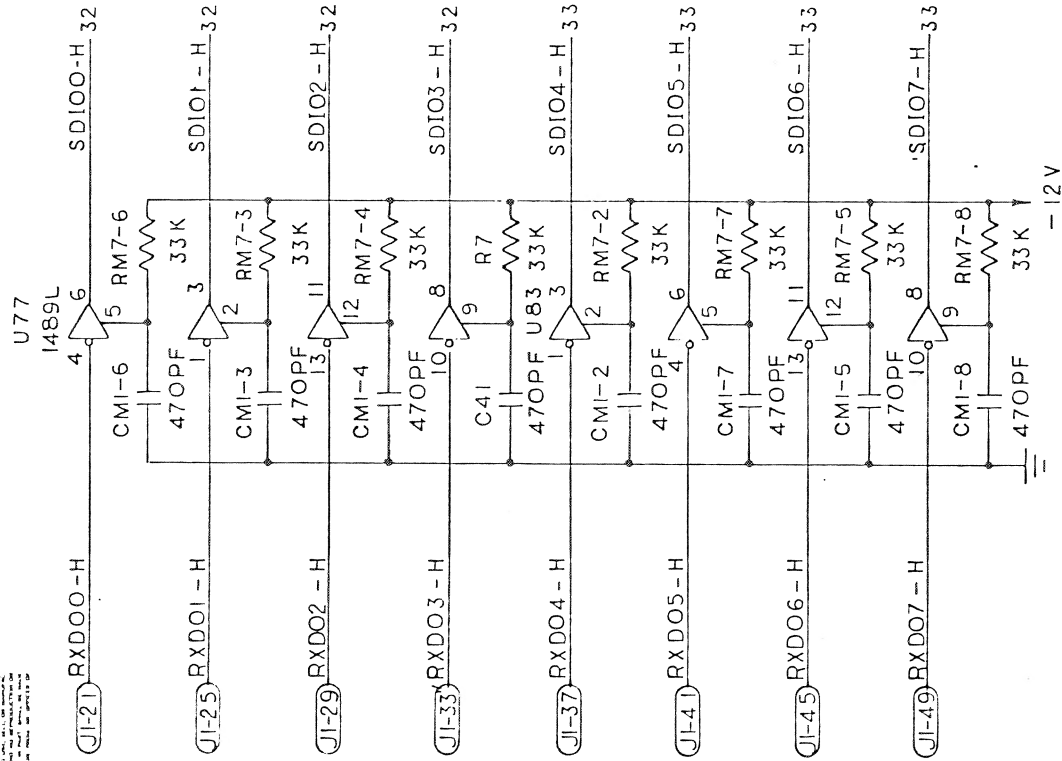


THIS DRAWING IS THE PROPERTY OF THE COMPANY AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM. THE COMPANY ASSUMES NO LIABILITY FOR ANY ERRORS OR OMISSIONS IN THIS DRAWING. THE COMPANY ASSUMES NO LIABILITY FOR ANY DAMAGE TO PERSONS OR PROPERTY ARISING FROM THE USE OF THIS DRAWING.

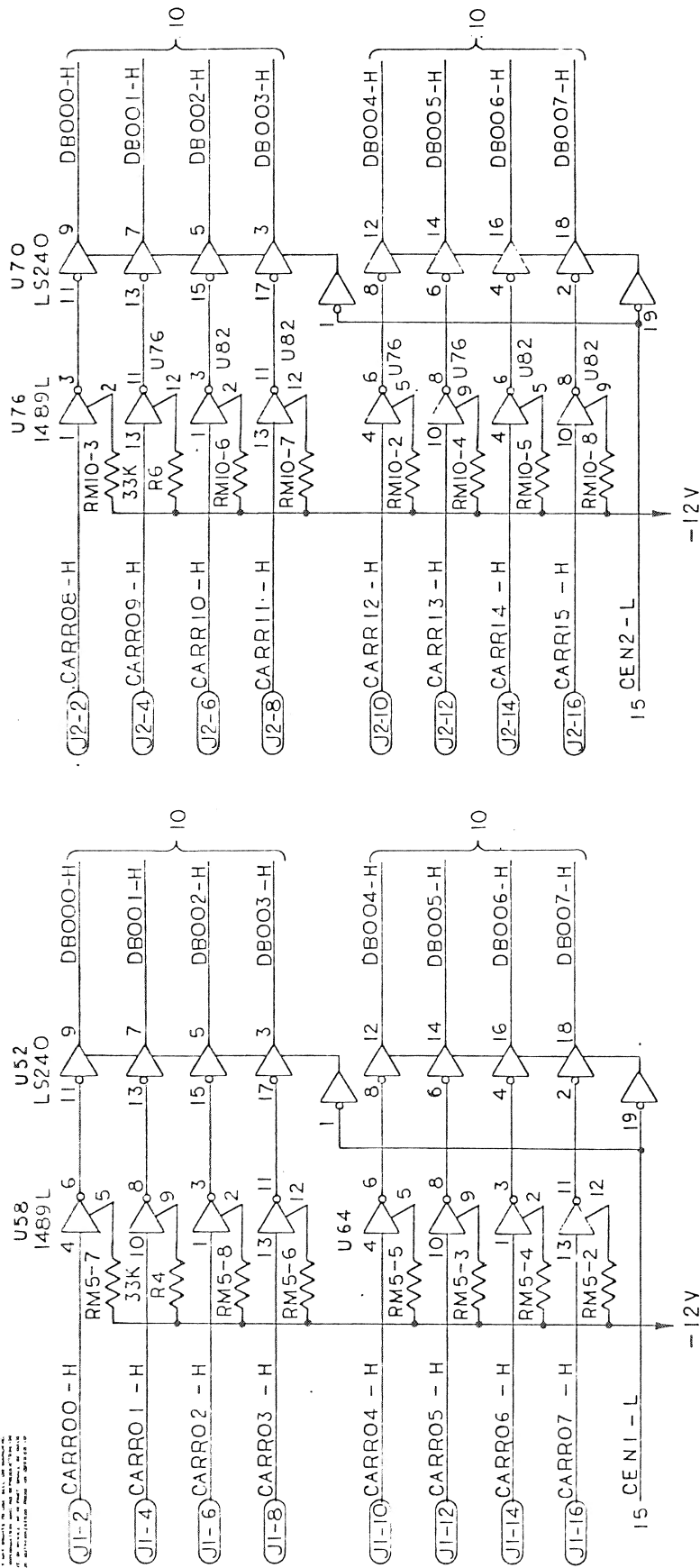


EIA TRANSMIT DATA CHO-CH15

ALL DIMENSIONS ARE IN MILLIMETERS UNLESS OTHERWISE SPECIFIED.
 DIMENSIONS IN PARENTHESES ARE FOR INFORMATION ONLY.
 DIMENSIONS IN SQUARE BRACKETS ARE FOR INFORMATION ONLY.
 DIMENSIONS IN CIRCLES ARE FOR INFORMATION ONLY.
 DIMENSIONS IN TRIANGLES ARE FOR INFORMATION ONLY.

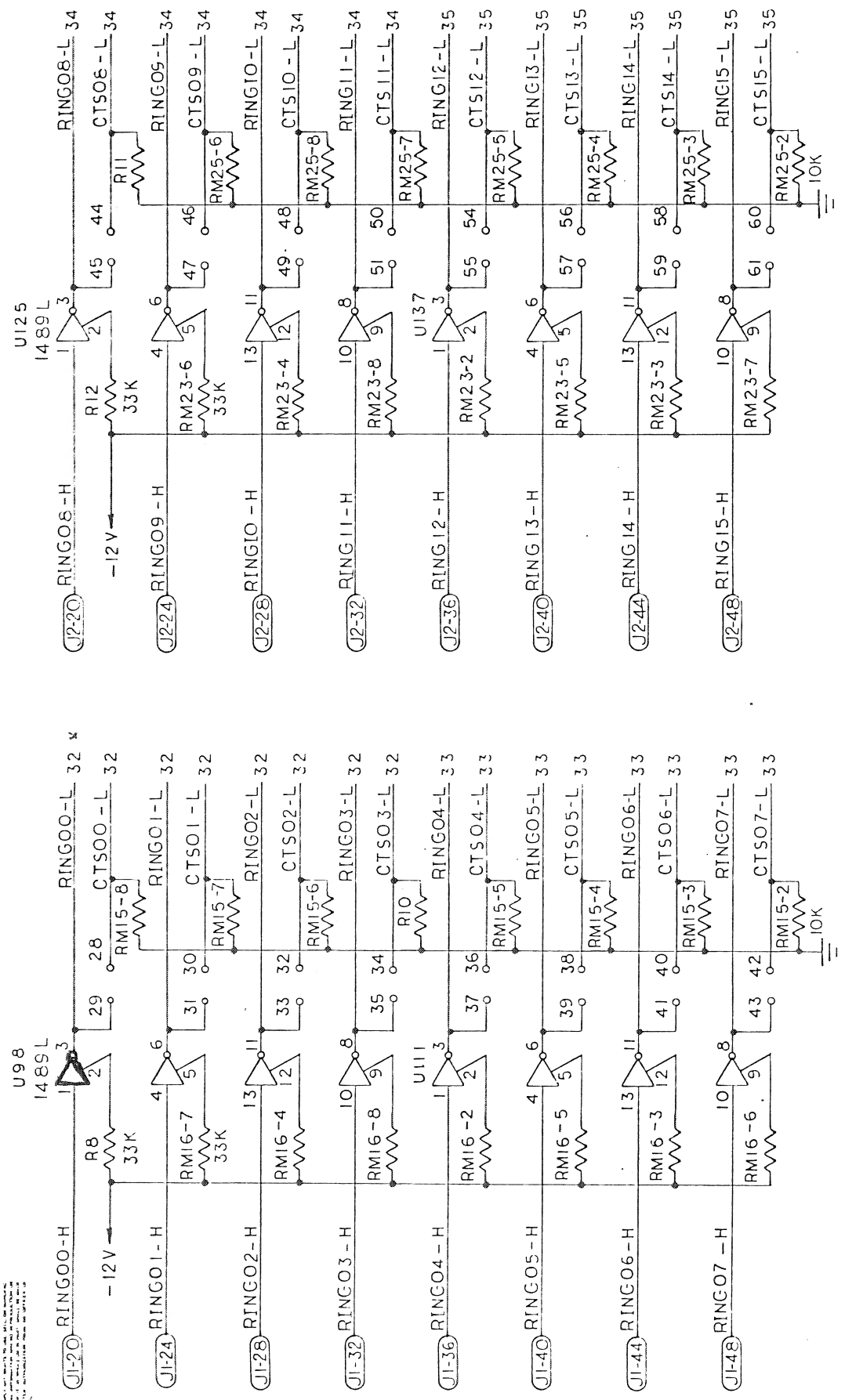


THE INFORMATION CONTAINED HEREIN IS THE PROPERTY OF
 THE BUSHNIP CORPORATION AND IS TO BE KEPT
 SECRET. IT IS TO BE USED ONLY FOR THE PURPOSES
 FOR WHICH IT WAS ORIGINALLY INTENDED. IT IS
 TO BE DESTROYED WHEN NO LONGER REQUIRED.
 THIS DOCUMENT IS UNCLASSIFIED.



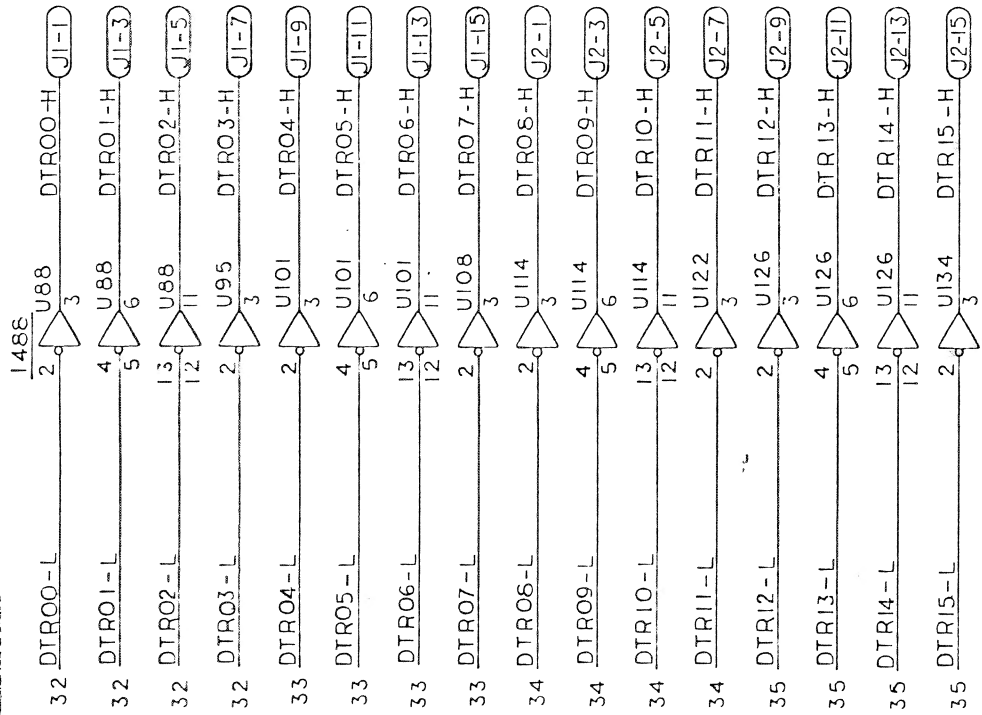
CARRIER EIA RECEIVERS AND BUFFERS

THESE CIRCUITS ARE DESIGNED TO OPERATE AT 100% RELIABILITY
 AND A 100% TEST RATE. THE CIRCUITS ARE DESIGNED TO
 OPERATE AT 100% RELIABILITY AND A 100% TEST RATE.
 THE CIRCUITS ARE DESIGNED TO OPERATE AT 100% RELIABILITY
 AND A 100% TEST RATE. THE CIRCUITS ARE DESIGNED TO
 OPERATE AT 100% RELIABILITY AND A 100% TEST RATE.



RING EIA RECEIVERS

THE INFORMATION CONTAINED HEREIN IS THE PROPERTY OF THE UNITED STATES GOVERNMENT AND IS LOANED TO YOUR AGENCY. IT IS TO BE USED FOR OFFICIAL PURPOSES ONLY AND IS NOT TO BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM, WITHOUT PERMISSION IN WRITING FROM THE UNITED STATES GOVERNMENT.



DATA TERMINAL READY